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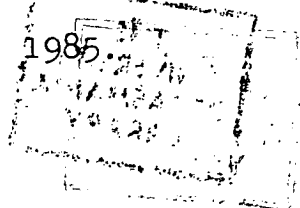
NEVILLE B GRADY

THE DEVELOPMENT, IMPLEMENTATION AND  
EVALUATION OF AN IN-SERVICE  
PROGRAM FOR TEACHERS

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## CHAPTER 1

### INTRODUCTION

This first chapter is an introductory one to provide a statement of purpose, to briefly overview the program under consideration, to discuss several aspects of evaluation, to introduce the evaluation model followed in the study, and to outline the structure of the remainder of the report.

#### THE PURPOSE OF THE DISSERTATION

The dissertation's purpose is to describe and judge the development, implementation and outcomes of a particular in-service training program for teachers. The program was conducted during 1984 in the Burnie area of the North-West Coast of Tasmania, and was entitled "Managing the Classroom Environment".

#### AN OVERVIEW OF THE PROGRAM

"Managing the Classroom Environment" itself, and its development, implementation and evaluation, were quite complex in a number of ways, and these complexities unfold in succeeding chapters. However, the reader will be assisted by the provision of a brief overview at this early stage.

The program was developed, implemented and evaluated by the writer and a colleague, who are both members of the staff of the School of Teacher Education within the Tasmanian College of Advanced Education. These two, together with a Primary Schools liaison officer, a regional staff development officer, a teachers' centre co-ordinator, and a senior teacher from one of the Burnie High Schools, formed a small

management group to facilitate the program's implementation. This group met on several occasions during the latter part of 1983 and early 1984. Funding was sought through the Federal Government's Participation and Equity Program and other sources, and a teachers' centre offered the use of its facilities.

It was intended that participating teachers would come from both Primary and High Schools; that they would be released from their schools for ten days of workshopping throughout the year; that they would enter the program in pairs and strengthen their collegial relationship during the year; and that they would return to their schools between workshops to apply their newly acquired or refined knowledge, skills and attitudes. The two program leaders (those from the TCAE) were both involved in all the workshop sessions.

The Principals of three Primary Schools and three High Schools each nominated two teachers to join the program. The twelve participants formed, indeed, a heterogeneous group : six from High Schools and six from Primary Schools; a Principal and several senior teachers; some with two or three years experience, others with much more; some seeking to use their work in the program to further their formal qualifications, others opting for non-assessment of their work.

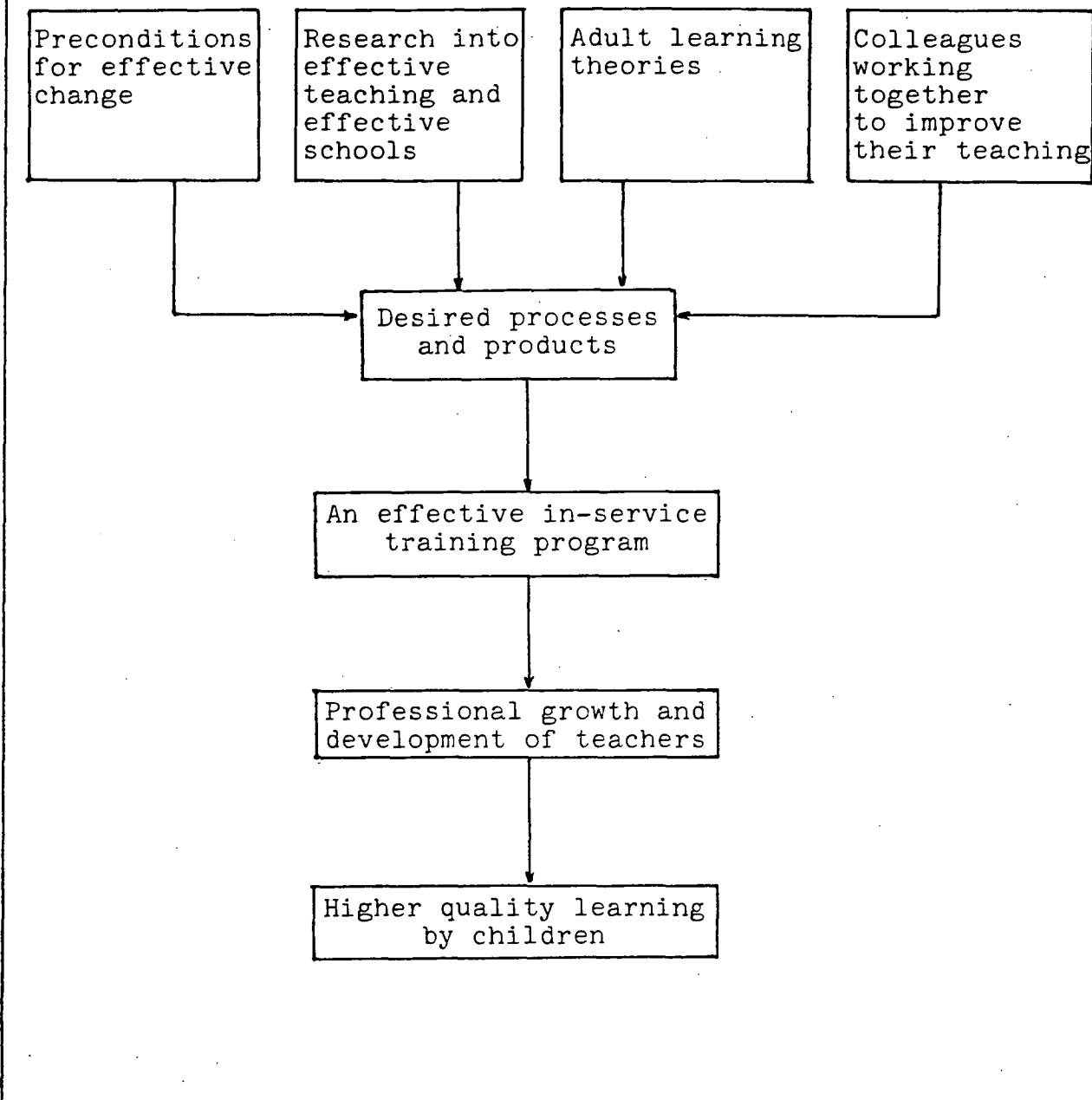
The program's product and process goals, together with the content covered, were derived entirely from the body of published theory and research. The major thrust

of the program was to encourage and assist participating teachers to analyse and reflect upon their teaching practices and upon the likely effects of these on the quality of student learning. Special emphasis was given to teachers, as colleagues, working together to achieve this end, and to student perceptions of their classroom environment.

The development of the program was based upon the views presented in Figure 1. Each of the aspects depicted in this figure is elaborated upon in succeeding chapters, but a brief description is essential at this point.

The ultimate purpose of any in-service training program for teachers was seen to be an improvement in the quality of learning enjoyed by children. In order to achieve this ultimate purpose, a degree of professional growth and development of the teachers themselves is necessary, and such professional growth and development can be facilitated by an effective in-service training program. In-service training programs though, in order to be effective, must pay close attention to their processes and products, and sound guidance in these areas can only come from good theory and research. Four highly significant areas of such theory and research are those concerned with a range of preconditions for effective change, including the nature of the school climate; with effective teaching and effective schools, including for example, the nature of the classroom environment and classroom management practices; with theories about how adults learn and transfer that learning to their work situation; and with teachers working together in a collaborative fashion to assist and encourage each other to improve their teaching.

Figure 1  
A PICTORIAL REPRESENTATION  
OF THE BASES FOR  
"MANAGING THE CLASSROOM ENVIRONMENT"



The program's developers adhere to the two perspectives sketched below, and endeavoured to integrate them into the program. The first is the view of Hoyle (as cited by Stenhouse, 1975, 144) that teachers are important in any innovation process because of their capacity for independent initiative in the classroom, their ability to 'champion' an innovation among colleagues, and because they are the ones who must ultimately operationalise the innovation in the classroom. The second is Stenhouse's view which is summarised in the following quotation :

Effective curriculum development of the highest quality depends upon the capacity of teachers to take a research stance to their own teaching. By research I mean a disposition to examine one's own practice critically and systematically. (Stenhouse, 1975, 156)

The essence of the program, then, was that pairs of teachers would come to the workshops where they would be introduced, through a variety of methods, to a range of recommendations that have emerged from theoretical perspectives and research findings. It was intended that the teachers would then return to their schools/classrooms to try out their selection of these recommendations with the assistance of a colleague, and that together they would share their experiences with others in their school and with others in the program. It was envisaged that professional growth and development would follow for these teachers, and that the quality of student learning would be enhanced as a result. It should be clear to the reader that, following Logan (1979) for example, any notion that an 'expert' should decide what, when and how the teachers were to learn was rejected by the developers of the program.



## EVALUATION PERSPECTIVES

The field of educational program evaluation is very broad indeed and no attempt is made here to summarise the field. However, a number of perspectives, which are significant to this report, are briefly discussed.

Programs such as the one described here are expensive in terms of time, money, energy and other valuable resources, both in absolute and opportunity cost terms. They must be evaluated in a summative way to determine their merit, value or worth, so that decision-makers can be guided in their deliberations concerning the future of the programs - whether to offer them again (or an alternative instead), and if so, in what form, where, when, to whom and by whom. However, satisfactory program outcomes are 'guaranteed' only if the programs are evaluated, in a formative way, DURING their development and implementation stages. This is not to say that, in practice, there is a clear-cut distinction between formative and summative evaluation, since with on-going programs summative evaluation can lead to program improvements in the future. (see, for example, Bolam, 1979, 2)

Robert Stake held that

BOTH description and judgement are essential - in fact they are the two basic acts of evaluation. (Stake, 1967, 525)

Although this view of evaluation is certainly not the only one (compare with Stufflebeam's view that evaluation is "a process of providing useful information for decision making." Stufflebeam, 1983, 120), it is the one accepted here, and as stated in the written purpose of the dissertation,

description and judgement are attended to.

'Goal-free' evaluation, as described by Michael Scriven (1983) for example, is frequently the ideal approach to adopt. This is because unintended outcomes may be as important (if not more important) as those which were intended, and because knowledge of the goals may promote perceptual biases among the evaluators. This is fair comment. However, the program was to seek the satisfaction of a number of stated goals and objectives, and, of course, the evaluators had intimate knowledge of them. Goal-free evaluation was impossible in this case. This is not to say, though, that the evaluators did not attempt to assess the nature and importance of any unintended outcomes.

While the evaluation aspects reported here are mainly concerned with goal attainment, they do satisfy Scriven's demand that

... evaluation proper must include, as an equal partner with the measuring of performance against intended goals, procedures for the evaluation of the goals. (Scriven, 1973, 73)

The rationale for this approach is that if the goals of a program have merit or worth, and if the goals are achieved through the program, then the program itself has merit or worth. This report reveals that attention was given to both the evaluation of the goals of the program and of the means to achieve those goals, and, further, that the evaluators contemplated the match between the intentions of the program on the one hand, and the realities of it on the other.

An important point to be raised is that of the credibility of an evaluation report. The credibility to be attached to it is usually enhanced if the evaluators are external to the program itself, for external evaluators may be able to be more highly 'objective' and 'open-minded'. Obviously though, this need not be the case. The program being considered here was developed, implemented and evaluated by the same two people. Inevitably, these two people have a range of biases in a number of areas. The problem has been brought into the open, and little more can be said on the point. However, some of the reader's uneasiness might be alleviated by the following views. Alexander maintained

Nor do we have clear evidence that the sort of evaluation a good teacher engages in if left to his own devices - in which he relies on experience, self-awareness, intuition and a finely developed sensitivity to varieties of student engagement in the educational experiences he provides - is any less reliable or useful than the relatively crude measuring devices which are sometimes used in formal evaluation programs. (Alexander, 1980, 187)

Further, Alexander added that

Methods [of evaluation] are also influenced by institutional factors; in practice decisions about evaluation methods are compromises between the need for methodological integrity and the constraints of time, resources, available expertise and above all, what those involved will countenance. (Alexander, 1980, 183)

The fact that the two program leaders collaborated closely in the program's development, in refining it, in its implementation, in monitoring its delivery, and in

refining it yet again, was a cornerstone of the evaluation process. They also had a definite evaluation strategy to guide them. If, as Alexander claimed, a good teacher can productively evaluate his programs, then two highly qualified and experienced (and perhaps self-aware, intuitive and sensitive) teachers should be able to do an even better and more credible job in evaluating their program.

An evaluation must revolve around the gathering, organisation and interpretation of data. Fraser (1973, 36) distinguished between two types of data : 'hard' and 'soft'. He defined hard data as being "OBJECTIVE data consisting of measurements of pupils' achievement of desirable educational goals." On the other hand, he saw soft data as being "SUBJECTIVE data consisting of the opinions of students, teachers and others." Fraser was persuasive in his call for the gathering of both types of data in an evaluation. He argued from two points of view. Firstly, he maintained that soft data can illuminate aspects not covered by hard data, especially the "unwanted side effects and incidental gains." (attributed to Robert Stake by Fraser, 1973, 39) Secondly, Fraser claimed that "every method of data collection is plagued with its own weaknesses, biases and errors of measurement." (1973, 39) Fraser therefore called for 'multiple operationism' or 'triangulation' by which the same object or process is viewed from two different vantage points by employing both hard and soft data.

This report contains a liberal sprinkling of hard, objective data, and soft, judgemental data. The bulk of

the data gathered for this evaluation is contained in a portfolio of artifacts which were produced and gathered during the year. This portfolio consists of a large sample of the literature which provided the basis for the program's desired processes and products. It also contains workshop programs and content summaries. Further, the artifacts include a number of reports written by the participants which describe their initiatives in their classrooms/schools as a result of the program. Unfortunately, the portfolio cannot be appended to this report.

Despite the fact that 'goal-free' evaluation was rejected as an approach to evaluation in this case, the literature provides a host of alternative 'models'. Texts such as Worthen and Sanders (1973) and Madaus, Scriven and Stufflebeam (1983) each outline at least a dozen frameworks. Each of these 'models' has its strengths and weaknesses, advantages and disadvantages. All can be used effectively at one time or another, but none can be used on all occasions. Few provide the evaluator with a 'blueprint' to follow. Despite the lack of attention paid to it in the more widely known literature, the Katz and Morgan 'Holistic Strategy for the Formative Evaluation of Educational Programs' was selected from those available as being most suitable to this particular task.

The Katz-Morgan strategy does provide a 'blueprint'. It is in sympathy with the classical Tyler 'objectives' model. Tyler described the evaluation process as follows :

The process of evaluation is essentially the process of determining to what extent educational objectives are actually being realised by the program of instruction and curriculum. However, since educational objectives are essentially changes in human beings, that is, the objectives aimed at are to produce certain desirable changes in the behavior patterns of the student, then evaluation is the process of determining the degree to which these changes in behavior are actually taking place. (Tyler, 1949, 105-106)

Many of the defences against attacks on Tyler's approach, as provided by Popham (1973), continue to be sound, and it would be argued by many that attention to the extent to which objectives are being/have been satisfied should play a part in any evaluation. Nevertheless, it must be admitted that to describe fully and judge a program it is necessary to go beyond the Tylerian approach. The Katz-Morgan model does focus the attention of the evaluator on more than goals and objectives. In particular, it forces the evaluator to focus upon the program's rationale and upon the degree of congruence between program components and between program intents and outcomes. In some ways, then, the model is not too unlike that proposed by Robert Stake (1967). Further, the model directs attention to 'inputs', 'processes' and 'products', and might satisfy, at least partially, Stufflebeam's search for guidance in making and defending decisions in order to improve, rather than prove, educational programs. (Stufflebeam, 1983) Not the least of the merits of the Katz-Morgan strategy is the fact that the evaluator is forced to contemplate the merit of the goals and objectives themselves. Elliot Eisner (1983) has advocated a 'connoisseurship' approach to evaluation. Just as a

connoisseur of good wine or a work of art can critically describe and appraise his subject, and report his findings to others, so Eisner saw evaluators 'tasting' and reporting upon educational programs, products and processes. With Alexander's comments in mind (see page 8), this approach to evaluation has a certain appeal. The Katz-Morgan model does not deny the connoisseur the use of his 'nose' and 'palate', but does provide him with a framework to guide his observations and reports.

The Katz-Morgan strategy directs the evaluator's attention to the degree of congruence between the program's

Mandate

Ultimate purpose

Desired products (at three levels of specificity)

Desired processes (at two levels of specificity)

Observed processes

Product outcomes.

The strategy is outlined in Figure 2. The strengths, weaknesses and utility of this approach are discussed, in hindsight, in the final chapter of this report. At this stage it is sufficient to say that it was modified at two points. Prior to step 1 indicated in Figure 2, a comparison was made between the ultimate purpose of the program and its mandate. Such a comparison was advocated in the text of the model, but for unexplained reasons, was omitted from their tabular presentation. Secondly, because the distinction between the 'program' and the 'environment' was blurred, the distinction between desired outcomes and desired outputs

Figure 2

AN HOLISTIC STRATEGY  
FOR THE FORMATIVE EVALUATION  
OF EDUCATIONAL PROGRAMS  
(Katz and Morgan, 1974, Table 1, 226)

STEP	COMPARE	RECOMMENDED MODIFICATIONS IF INCONGRUENCE IS IDENTIFIED
--1	Ultimate purpose with desired outcomes	Desired outcomes
2	Desired outcomes with desired outputs	Desired outputs
3	Desired outputs with behavioural objectives	Behavioural objectives
4	Desired outputs with process goals	Process goals
5	Process goals with process objectives	Process objectives
6	Behavioural objectives with process objectives	Process objectives
7	Process objectives with observed processes	Process objectives
8	Behavioural objectives with attributes of participants as described by behavioural objectives	Process objectives
9	Desired outputs with observed outputs	Behavioural objectives
10	Desired outcomes with observed outcomes	Desired outputs



was necessarily blurred too. The components of the strategy are defined as they are introduced in this report, and explanations for the recommended modifications are offered as they are encountered.

The structure of the remainder of this report is governed by the Katz-Morgan strategy. Most dissertations probably allocate a single chapter to a review of the relevant literature. In this case such a review is dispersed throughout the report. Ample headings and subheadings should prevent the reader from having difficulty with this arrangement. Chapter 2 pays close attention to the program's mandate and its ultimate purpose, and examines the degree of congruence between the two. Chapter 3 is devoted to a description of the desired products of the program. Chapter 3 also attends to the degree of congruence between the general goals and the program's ultimate purpose, and between the desired products at each level of specificity. Desired processes are discussed in Chapter 4. Particular attention is given to the preconditions for effective change, adult learning theories and colleagues working together to improve their teaching. The merit of the process goals is discussed, as is the degree of congruence between process goals and process objectives, and between the desired processes and desired products. Chapter 5 focuses upon the observed processes, and Chapter 6 upon the observed products of the program. The final chapter pays attention to summative evaluation, draws conclusions, discusses implications and makes recommendations.

## CHAPTER 2

### MANDATE AND ULTIMATE PURPOSE

No educational program can have merit, value or worth unless its ultimate purpose has merit, value or worth, and in order for its ultimate purpose to have these characteristics the program's mandate must be satisfied. This chapter attempts to discover the mandate of "Managing the Classroom Environment", to outline the ultimate purpose of the program, and to address the question of the degree of congruence between them.

#### THE PROGRAM'S MANDATE

The mandate for the program is both nebulous and informal and is derived from a wide variety of sources. A number of these sources are acknowledged here.

Since schools (and Colleges of Advanced Education) are the educational agents of society, they must attempt to interpret the wishes of society. (The School in Society, 1968) The 'wishes of society' though, are many, varied, ever-changing, and often in conflict with each other. One composite interpretation of our society's wishes is :

1. Schools must assist students "in the competition for socio-economic success", and in their "development as a person and a member of society"; and raise or maintain standards of education within society. (Schools Commission, 1981)

2. Schools must assist in

... the pursuit of excellence, the transmission of valuable knowledge, the promotion of greater equality of opportunity, the development of values in an increasingly pluralist and multicultural society, and the advancement of the welfare and progress of the nation.  
(Schools Commission, 1981)

3. Schools must provide access to education for people of all ages and all different backgrounds in order to satisfy a demand for lifelong learning. (Ford, 1981)

A number of reports to the Tasmanian Government or its agencies have made calls for initiatives in the professional development and growth of teachers. For example, the TEND Report maintained that

Teacher education, both pre- and in-service, will need careful and constant attention to ensure that there are enough teachers who understand the new ideas and have the skill to put them effectively into practice ....  
(TEND Report, 1978, 4)

Further, this report observed (supported by the COPE Report, 1980, 76) that the teaching profession must be

alert, ready to accept change, critical of its own performance, and interested in ways of improving educational activities.  
(TEND Report, 1978, 105)

Similarly, the Scott Report called for teachers to consider their INTENTIONS in their interactions with their students, and recommended that they involve themselves in continuous professional development, by which they alert themselves to recent developments in education and discuss methods and problems with their colleagues. (Scott Report, 1977, 78, 188, 233)

The Federal Government has provided input to the mandate. In its Participation and Equity Program, for example, it has called for "doing new things" in making "life at school better for students in a variety of ways". (Research Branch, Tasmanian Education Department, 1983)

Published works in the areas of educational theory and research provide direction, thrust and impetus. Louis Rubin (1978), for example, maintained that some form of teacher growth was essential in order to improve schooling for children, and that such teacher growth should include in-service training which focuses on the practical application and cumulative practice of fundamental skills.

Further, the Tasmanian College of Advanced Education has been given an unambiguous directive by the Tasmanian Government to extend its offerings to the people of the North-West Coast, and this is given fiscal support by the Federal Government in its budgetary considerations.

In addition, a number of senior teachers and Education Department personnel in the North-West region expressed a desire for an in-service program which, among other things, would pay attention to the Grade 6-7 transition problem, recent research findings in the area of classroom environment impact on student outcomes, and the prospect of 'schools after corporal punishment'.

Many writings of Herbert Walberg were inspirational in the development of the program, and the following quotation appears to be particularly appropriate to conclude this overview of the program's mandate.

It still seems reasonable in a democratic society to raise skeptical questions about the effectiveness and efficiency of our public agencies, including the schools, rather than to place complete trust in tradition or expert opinion. With respect to effectiveness, democracy assumes an educated citizenry; if education can be improved by objective means, so much the better for society and individuals.  
(Walberg, 1982, 1)

#### THE PROGRAM'S ULTIMATE PURPOSE

The program aimed at assisting teachers to reflect upon their teaching practices and those of their colleagues, to acquire and improve their technical teaching skills, and to integrate those skills into their active repertoires. Nevertheless, this aim was an intermediary one. As Figure 1 shows, the ultimate purpose of the program was to assist participating teachers to promote higher quality learning among their students, in particular, and more generally, among the students in their schools. It is necessary to contemplate the meaning of 'high quality learning'.

After Lefrancois (1972) and Gagné (1977), the program developers accepted that learning can be defined as a change in human disposition, capability, performance or behaviour, which persists over a period of time, and which results from experiences rather than from maturation.

It followed that they accepted that the quality of learning can be defined in terms of the degree to which such dispositions and the like are changed in a desirable direction, the speed with which such changes are effected, and the longevity of the resultant changes.

The developers agreed with the views of Cuban and Raven. Cuban maintained that parents and educators

... prize outcomes of schooling that reach beyond current definitions of effectiveness : sharing, learning to make decisions, developing self-esteem, and acquiring higher-level thinking skills ... and aesthetic sense. (Cuban, 1983, 695)

Raven (reported by Walberg, 1984, 25) concluded that, given a choice, educators, parents and students rank goals such as co-operation, critical thinking, self reliance, constructive attitudes, and lifelong learning above 'achievement' as revealed by test scores and marks.

These two perspectives, together with that provided by the Hoy and Miskel model of organisational effectiveness (1982), pointed to the following definition of high quality learning :

High quality learning is evident if

- . student academic achievement
- . student adaptability
- . student satisfaction
- . student central life interest in learning

for the class and for individuals, are all at a high level.

This definition, from an operational point of view, is fraught with difficulties. Nevertheless, Walberg provided a neat solution :

... research shows that student perceptions can be validly measured and that they serve as INDEXES, for classes or individual students, of the amount of cognitive, affective, and behavioral learning that takes place during the school year or during shorter periods of time. (Walberg, 1982, 291) (my emphasis)

The four components of high quality learning presented on the previous page could, fairly, be encompassed within Walberg's ambit of 'cognitive, affective, and behavioral learning'.

Given the above discussion, the following proposition suggests itself. Indeed, this proposition was central to the program's development, implementation and evaluation.

High quality learning, when viewed in a broad sense to include student academic achievement, adaptability, satisfaction, and central life interest in learning, can be promoted by ensuring that students are in their preferred psychosocial classroom environments. Further, the extent of such learning can be gauged by the degree of congruence between student-preferred and student-actual perceptions of their classroom's psychosocial environment.

#### CLASSROOM ENVIRONMENT LITERATURE REVIEW

The frequently quoted Coleman Report (see for example Hoy and Miskel, 1982) concluded that, in the USA situation,

when home background variables (which do have considerable influence upon the student's self-image) were controlled, school factors did not explain variances in test scores. Marjoribanks (1974) also found that the effect of the school on student outcomes was minimal in comparison to the impact of the home environment. Findings such as these generated a sense of 'school doesn't matter' among some during the late 1960's and through the 1970's.

Ultimately though, it became obvious to many that this view was far too extreme. Indeed, some writers went too far in the other direction, and downgraded the influence of the home.

Brookover (cited by Hoy and Miskel, 1982, 332) found that as much as 80% of the variance in achievement which occurred between students could be attributed to student and teacher expectations of, and commitment to, high quality learning.

Further, Walberg (1981) maintained that research has shown that learning is a function of seven factors :

Student Age (Age)

Student Ability (Abl)

Student Motivation (Mot)

Quality of Instruction (Qul)

Quantity of Instruction (including self-instruction) (Qun)

Psychological Environment of the Classroom (Cls)

Psychological Environment of the Home (Hom)



In fact, Walberg claimed that he had brought the famous Cobb-Douglas agricultural function into the field of education, and provided the following equation :

$$\text{Learning} = a(\text{Age})^b(\text{Abl})^c(\text{Mot})^d(\text{Qul})^e(\text{Qun})^f(\text{Cls})^g(\text{Hom})^h$$

where a represents a constant, and where b through h are positive but less than one.

Walberg (1982, 118) suggested that this equation could be used to make more

... confident our understanding of school learning and point out the most potent, least difficult means of maximising learning.

More recently, Walberg (1984) extended his list of "potent, consistent, and widely generalizable" factors to include the peer group outside the school and the use of out-of-school time (specifically, the amount of leisure time allocated to viewing television). While Walberg acknowledged that other factors may influence learning, he maintained that

... improvements in the more direct and more alterable factors hold the best hope for increasing educational productivity.  
(Walberg, 1984, 21)

A most significant claim by Walberg (1981, 245) was that a doubling of the impact of the psychosocial environment of the classroom resulted in a 43% increase in learning. Other research supports Walberg's findings. Haertel, Walberg and Haertel (1981), for example, found that students' perceptions of cohesiveness, satisfaction, task difficulty, and goal direction in the psychosocial environment of the

classroom were positively related to student achievement, performance and self-concept. Friction, cliques, apathy and disorganisation, on the other hand, were found to be negatively related to those outcomes.

Rudolf Moos (1979) provided a useful conceptualisation of the psychosocial environment of the classroom. This conceptualisation is summarised in Figure 3.

Figure 3

THE PSYCHOSOCIAL ENVIRONMENT OF THE CLASSROOM  
as conceptualised by Rudolf Moos

1. Relationship dimensions which identify -	the nature and intensity of personal relationships, the extent of involvement and the extent of support for others	e.g., the degree of teacher support, affiliation, cohesiveness, friction
2. Personal development dimensions which assess -	the basic directions along which personal growth and self-enhancement occur	e.g., the degree of competition, task orientation, independence
3. System maintenance and change dimensions which involve -	the extent to which the environment is orderly, clear in expectations, maintains control and is responsive to change	e.g., the degree of teacher control, rule clarity, democracy, diversity

The nature of the psychosocial environment of a particular classroom can be assessed through a variety of means. These means include naturalistic enquiry, through which an observer provides an exhaustive, qualitative description; systematic coding of predetermined aspects of

classroom life by a trained observer; teacher perceptions of the environment; and student perceptions of the environment. Not only can student perceptions be validly measured (Walberg, 1982, 291), they can be measured economically. Further, since students experience the classroom's environment all day every day, their perceptions of it are most likely to be accurate. Moos summed this up nicely :

Students are a good source of information about a class, since they have encountered many different learning environments, are in a class for many hours, and have enough time to form accurate impressions of the classroom milieu. (Moos, 1979, 139)

A number of well validated instruments are now available to assess student perceptions of their classroom's psychosocial environment. A number of these instruments are available in two forms - one form to assess the environment as it ACTUALLY IS (in the eyes of the students), and a second form to assess the environment as the students would PREFER it to be.

Hunt (1975) maintained that person-environment fit or congruence is positively related to student academic performance. This conclusion was supported by Walsh and Russel (cited by Nielsen and Moos, 1978). In addition, Fisher (1982) and a number of others (e.g., Fraser and Deer, 1983, Fraser and Rentoul, 1980) have found that student outcomes other than academic performance, such as satisfaction, are also promoted if students are in psychosocial environments which match those they prefer. Fisher (1984, 16) summed up as follows :

The approach of maximizing actual-preferred congruence enhances an individual's functioning, satisfaction, and productivity within an environment.

Again, perhaps "functioning, satisfaction, and productivity" is not too far removed from the "achievement, adaptability, satisfaction, central life interest in learning" definition of high quality learning offered earlier in this report.

#### RELEVANCE TO THIS PROGRAM

It will be recalled that the ultimate purpose of the program was stated to be the promotion of higher quality learning among children. The literature review suggests, quite strongly, that this ultimate purpose can be achieved through teachers being assisted and encouraged to 'engineer' the psychosocial environment of their classroom, so that student perceptions of the actual environment match as closely as possible their perceptions of how they would prefer their environment to be. The program pays particular attention to this perspective. This is not to say, though, that such environment 'engineering' is a panacea for all the ills that may be evident in classrooms and schools. As a result, other perspectives are given attention as well.

## EVALUATION

The formative evaluation question addressed at this stage of the program's development was :

To what extent is the ultimate purpose of the program, as stated, congruent with the mandate outlined at the beginning of this chapter?

The developers of the program, given their experience, knowledge, imagination, intuition and the support of the theory and research outlined in this chapter, were convinced that the ultimate purpose matched the mandate closely. However, the question was offered to a panel of experienced educators, each with expertise in curriculum development, delivery and evaluation. The responses of these panelists reinforced the positive opinion of the program developers.

### CHAPTER 3

#### THE DESIRED PRODUCTS OF THE PROGRAM

In order to satisfy the ultimate purpose of the program, its developers paid close attention to the desired products. In other words, the professional growth and development of the participants was not to be left entirely to chance.

The Katz-Morgan strategy dictates that the desired products should be contemplated at three levels of specificity : desired outcomes or goals at the most general level, then desired outputs, and then, at the most specific level, behavioural objectives. The basic criterion to be applied during this development phase is that concerned with the degree of congruence between the three levels.

The rationale for this approach is that the validity of the program's ultimate purpose had already been established; the general desired outcomes should therefore be in sympathy with that ultimate purpose; that the more specific desired outputs should be aligned with the desired outcomes, so that the latter can be achieved; and that the behavioural objectives should be congruent with the desired outputs so that the latter, in turn, can be achieved. This is clearly evidenced in the first three steps of the strategy depicted in Figure 2.

The organisation of this chapter follows these steps closely, and as a result the literature review is dispersed throughout the chapter.

It was at this stage of the program's development that the 'Research into effective teaching and effective schools' aspect of Figure 1 was of considerable significance.

Following the argument of Phillips (1981) any view of teacher as 'conscious automata', in the Descartes tradition, was rejected. In order to change any teacher's behaviours, he must be assisted to change his beliefs and intentions, and this is no easy task. According to Phillips (1981) :

1. there is no reason to believe that effective teachers can offer reasons for their success - they know HOW, but they frequently do not know THAT;
2. a teacher's 'justifications and deep-lying motives' may overlap stated intentions;
3. actions may be designed to achieve conscious purposes, but in addition, may bring about unintended outcomes;
4. desirable results may emanate from misplaced intentions, and similarly, disastrous results may follow from worthy intentions; and
5. a number of (justifiable?) teacher intentions may not be directly related to desired student outcomes.

Given this view, the developers of the program determined not to 'impose' any of their beliefs upon the participants. Rather, a variety of perspectives were to be offered at most points to encourage discussion, reflection, and action in accord with the teacher's needs and situation.

A search of the contemporary literature in the areas of effective teaching and effective schools (here used in a non-aligned sense) revealed a vast number of general recommendations towards which to aim. Twenty five such recommendations were extracted and offered to a validation panel of four college lecturers with expertise in the area. In addition, thirty one Tasmanian teachers, all reading towards a higher degree, and all familiar with this body of literature were surveyed. Each of these two groups indicated a high degree of acceptance of these twenty five recommendations. The developers based their general goals or desired outcomes for the program upon these recommendations.

#### THE DESIRED OUTCOMES OR GENERAL GOALS OF THE PROGRAM

Katz and Morgan (1974, 214) defined desired outcomes as being the desired "interactions between the outputs of the program and the environment". The outputs of the program were the participating teachers, and their environment consisted of their classrooms, schools and other places teachers meet. Eight desired outcomes were selected and these are described below.

1. To promote those teacher behaviours which are likely to establish a classroom environment which is sympathetic to the preferences of students.

Classroom environment research findings were overviewed in Chapter 2 of this report. Suffice to say here that it seems if teachers can change the psychosocial environment of the classroom in ways that create a closer alignment



between student perceptions of the environment as it really is and student perceptions of how they would prefer it to be, then the quality of learning will be improved.

2. To promote those teacher behaviours which might reduce the amount of time wasted, increase student time-on-task, and increase student academic learning time.

Time is, indeed, a scarce and valuable resource. The literature offers many insights into the effective and efficient use of time in the classroom. Effective teachers do, for example, ensure that time is allocated to instruction (Clauzet and Gaynor, 1982, Murphy, 1982, Rubin, 1982). They also ensure that students are involved, in that they actively work on the academic content at hand (Squires et al, 1983); that interruptions are minimised and that transitions between activity segments are planned (Anderson, 1984); that they reinforce student behaviours which indicate that they are paying attention, completing tasks, volunteering, and complying with teacher requests (Anderson, 1984); that there is adequate coverage of new material (Squires et al, 1983) but at the same time students are given sufficient time to practise the material being learnt (Berliner, 1982); and that students spend a good proportion of their time working on tasks which are challenging but which offer them a fair chance of success (Berliner, 1982, Squires et al, 1983). Involvement, coverage and success by students seem to be essential criteria for high quality learning to occur.

3. To encourage teacher behaviours which might assist students to avoid any sense of learned helplessness or academic futility.

Riordan (1982) maintained that the most significant factor in determining poor student performance is student sense of learned helplessness or academic futility. The Porter-Lawler model of motivation (Owens, 1981) provides valuable insights into this problem. The model suggests that people will devote effort to a task only if they anticipate that they have a reasonable chance of completing the task and, hence, receiving an expected (extrinsic or intrinsic) reward, and only if they value the anticipated reward sufficiently highly. A number of implications can be drawn from this brief discussion. Effective teachers might be expected to provide appropriate, equitable rewards; 'break down the barriers' which prevent student effort resulting in successful performance of tasks (e.g., through setting appropriate goals, establishing order and organisation, and allocating sufficient time to the task); and assist students to perceive any failure to be the result of a lack of effort on their part rather than any lack of ability (Maehr and Willig, 1982). As a result of practices such as these, students might be led to think of themselves as 'origins' rather than 'pawns' in terms of the control they perceive themselves as having over their lives (Richard de Charms, as reviewed by Brennan, 1982).

4. To assist teachers to adopt behaviours aimed at promoting student leadership, responsibility, co-operative activity and participation in decision-making.

A strong case has been established in favour of teachers employing co-operative strategies as the basis for classroom activities (e.g., Johnson and Johnson, 1975, Slavin 1980, 1983, Allen, 1983). Strategies such as 'Teams-Games-Tournament' and 'Jigsaw' (Slavin, 1980), and peer and cross-age tutoring appear to be valuable tools in promoting high quality learning. Less formal strategies, too, may be potent in promoting such outcomes. For example, a recent project (Claridge, 1984) resulted in teacher-devised co-operative strategies leading to almost perfect congruence between a typing class' perceptions of preferred and actual involvement, affiliation, teacher support, task orientation, order and organisation and rule clarity.

Student responsibility and participation in decision-making are central to a number of approaches to good discipline, and are advocated by, among others, Murphy (1982), Maehr and Willig (1982), Wolf et al (1981) and Mackenzie (1983).

5. To assist in the development of teacher behaviours that are likely to promote order, organisation, good discipline and good teacher-student relationships.

Emmer and Evertson (1981) drew on Kounin's research to stress the need for teachers to establish expectations for behaviour, and to teach classroom rules and procedures to their students. To implement and maintain an effective

classroom management system, Emmer and Evertson argued that the teacher must be able to demonstrate a number of monitoring skills, including prompt and accurate 'desists', handling several events simultaneously and keeping the class alert.

A number of useful theoretical and research foundations have been laid to assist the teacher establish good discipline and good interpersonal relationships in the classroom. Thomas Gordon's (1979) distinction between 'teacher-owned' problems and 'student-owned' problems, William Glasser's (1984) definite set of procedures, Robert Spaulding's (1983a, 1983b) systematic approach to treating different types of children differently, and Maurice Balson's (1984) view of groups being encouraged to participate in discipline/management procedures, all offer valuable insights to this ever-present and ever-increasing problem.

6. To promote teacher behaviours that are likely to provide a balance between individual activities, group activities, personal meanings, culturally defined meanings, current enjoyment and possible future utility.

Sergiovanni and Starratt (1979) presented a 'human resources' perspective of how school goals can be achieved through the 'human growth' of its constituents. Such human growth, in turn, was seen to be possible only through the provision of opportunities for students and teachers

to have "satisfying and fulfilling experiences in the educational process." (Sergiovanni and Starratt, 1979, 250) These writers maintained that a student's self-concept, and his consequent perceptions of the degree of control he has over his own destiny, is a dominant factor determining his achievement at school, and that many adolescents make

tenacious attempts ... to frustrate the designs of the system of schooling precisely because it communicates so little respect for them as persons, and because it fails to provide them with genuine opportunities for personal commitment. (Sergiovanni and Starratt, 1979, 251)

Sergiovanni and Starratt drew heavily upon the works of Abraham Maslow, James Macdonald and Dwayne Huebner to formulate a model of a 'human curriculum' which stresses the need for an appropriate balance between the six elements that make up this goal.

7. To assist teachers to develop behaviours that lead to an 'aligned' curriculum in their classrooms.

An exaggerated example serves to illustrate the intent of this general goal.

Aim	Children will learn to ride a bicycle
Specific objective	Children will repair a puncture in a bicycle tube, using a vulcaniser kit and given the necessary tools, in five minutes
Content	The evolution of the bicycle
Learning experiences	Children view a film of a bicycle race
Evaluation item	Children list the Olympic Games medal winners in cycling since World War II

A teacher who offered a curriculum such as this could hardly be said to test what was taught and teach what was intended. An aligned curriculum satisfies these requirements.

8. To promote teacher behaviours that are of a high technical quality in terms of, for example, questioning, explaining and reinforcing.

Sydney Micro Skills Redeveloped (Turney et al, 1983) provides a theory and research based coverage of many of the technical skills demonstrated by effective teachers. Other investigations, however, abound.

The reader will have noticed that these general goals seem to overlap and reinforce each other. The developers of the program maintain that this was one of the program's strengths. Further, such overlapping prevents any meaningful prioritisation of the general goals.

## EVALUATION

The relevant formative evaluation question to be posed at this stage was :

To what extent are the desired outcomes (general goals) congruent with the ultimate purpose of the program?

The process by which the desired outcomes were selected (determine ultimate purpose, search the literature for recommendations on how to achieve that purpose, check the acceptance of those recommendations by a large sample of experienced and knowledgeable teachers, derive desired outcomes from well-supported recommendations) served its purpose well in the eyes of the program's developers.

This is not to say that the stated desired outcomes are the only possible ones. Nor can the developers maintain that they are the most effective and efficient in terms of their ability to satisfy the program's ultimate purpose. The current state of the art does not allow a valid judgement on this latter point. Herbert Walberg (1984) and Benjamin Bloom (1984) have recently reported exciting findings in the search for the most productive mix of factors. This work is at a very early stage, but it was heartening to the developers of this program to note that several of their stated desired outcomes have been given high effect size by both Walberg and Bloom.

#### THE DESIRED OUTPUTS OF THE PROGRAM

In order to ensure that the program could achieve its desired outcomes, and therefore its ultimate purpose, the developers of "Managing the Classroom Environment" turned their attention to more specific desired products : the desired outputs of the program.

Katz and Morgan (1974, 215) defined the desired outputs as the desired conditions of the program participants upon completion of the program, but prior to any interaction with their school environment. In other words, the desired outputs were seen to be the more specific abilities of the participants unconfounded by the vagaries of their environment which are beyond the reach of the program's influence. This definition could not be adhered to in this project since the intention was that the program would

operate simultaneously in the school and the workshop. Instead, the desired outputs were seen to be intermediary between general goals or desired outcomes and specific behavioural objectives, combining several specific behavioural objectives together as stepping stones towards the general goals. With this interpretation, there would be no need to consider desired outputs if the specific behavioural objectives were exhaustively stated.

While theory and research pointed quite clearly to a bevy of worthwhile general goals, such guidance was less marked at this more specific level. It is clear, for example, that effective teachers do ensure that there is order and organisation in their classrooms, but it is less clear what they actually do to achieve this order and organisation. The literature appears to be moving into a phase which is characterised by a call for moderation in the extent and intensity of claims to finding the 'right medicine'. D'Amico (1982) for example, cast doubts on the research base employed by proponents of the 'effectiveness movement', and more recently Cuban (1983), McFaul (1983) and Ralph and Fennessey (1983) added their caveats. Cuban demanded caution as a result of the following observations :

1. No one knows what to DO in order to achieve effective schooling;
2. The language of the "effectiveness school" is 'fuzzy';
3. Typically, research has concentrated only on the basic skills in literacy and numeracy; and
4. Research has been undertaken mainly at the Primary level to the exclusion of other levels.



A strong case has been built in favour of 'direct instruction' as the preferred method of teaching basic competencies in mathematics and reading in the Primary Schools. McFaul (1983), however, correctly pointed out that this does not mean that it is the preferred method for all purposes at all levels of schooling. Indeed, 'direct instruction', if used exclusively, would actually prevent a number of desired outcomes of this program, and hence its ultimate purpose, from being achieved.

In order to satisfy a number of the desired outcomes, the program attempted to develop a growing awareness among the participants of the program of what actually takes place in their classrooms. However, since all classrooms are very complex places and because each is unique, they cannot be adequately contemplated in a workshop situation. Teachers, though, typically work in isolation from colleagues and need to be assisted in their attempts to achieve this increased awareness. The program developers accepted the recommendation of a number of researchers that the participants be introduced to the rationale, process, roles and skills of 'clinical supervision' as practiced by colleagues. This was viewed as a process to achieve increased awareness rather than as an outcome to be valued for itself, and is overviewed in some depth in Chapter 4.

An essential ingredient of such collegial supervision is the mutual agreement of aspects to be focused upon in the improvement process. It would be quite inappropriate for this program's developers to attempt to identify all of the more specific desired outputs and behavioural objectives.

Nevertheless, a number of desired outputs were identified, and a sample is provided here.

1. In order to establish a classroom which is sympathetic to the preferences of students (desired outcome 1), products of the program should be able and willing to engage in the following cycle :

- i) Assess the psychosocial environment of the classroom from both student-preferred and student-actual perceptions;
  - ii) Obtain feedback through the generation of environment profiles;
  - iii) Reflect upon the profiles and possible intervention strategies and discuss these with colleagues and students;
  - iv) Intervene to change the environment;
  - v) Reassess student-actual perceptions.
- (This strategy was advocated by Fisher, Grady and Archer, in press)

2. In order to make good use of time in the classroom (desired outcome 2) participants should be able to :

- i) Observe and record the use of time;
- ii) Compose routine procedures for starting and finishing lessons, and for facilitating a smooth transition from one activity segment to another;
- iii) Identify the 'survival skills' demonstrated by students and develop appropriate techniques to reinforce those students who exhibit desired survival skills.

3. Participants should become aware of any of their behaviours which are likely to communicate inappropriate expectations of student behaviour and performance to students. The development of such an awareness should enable desired outcome 3 (assisting students to avoid any sense of 'learned helplessness') to be at least partially satisfied.
4. Teachers should become more committed to co-operative learning (desired outcome 4) if they are able to
  - i) Analyse classrooms to determine the dominant task structure, authority structure and reward structure;
  - ii) assess students' preferences for co-operation rather than competition;
  - iii) understand the potential benefits of peer and cross-age tutoring in classrooms.
5. In order to achieve desired output 5 (order, organisation, good discipline and good teacher-student relationships) the products of the program should be able to
  - i) demonstrate 'with-itness', 'overlapping' 'smoothness and momentum' and 'group alerting' (Emmer and Evertson, 1981);
  - ii) Categorise problems according to the Spaulding (1983a, 1983b) and Gordon (1979) schemes.
6. A start can be made toward the achievement of a 'human curriculum' (desired outcome 6) if the participants in the program are able to analyse a series of lesson

plans to discover the emphasis given to individual activities, group activities, personal meanings, culturally defined meanings, current enjoyment and future utility.

## EVALUATION

Given the caveats stressed at the beginning of this aspect of the report, little can be said on the formative evaluation processes followed. The developers had the desired outcomes firmly in mind, but they had to rely heavily upon their experience, intuition and so on to establish the desired outputs of the program. All that can be concluded is that the developers themselves were satisfied that they had sought to ensure a high degree of congruence between the desired outputs and the desired outcomes. This problem became all the more acute in the formative evaluation at the next stage : the congruence between the desired outputs and their supporting behavioural objectives.

## BEHAVIOURAL OBJECTIVES

Logically, and in conformity with the Katz-Morgan strategy of formative evaluation, the next step in the program's development was to contemplate the behavioural objectives which the participants should be able to satisfy.

Behavioural objectives, the most specific of the desired products, should state what participants should be able to do in observable terms, to what standard and under what conditions as a result of the program. However,

because of the fact that much of the program was to take place in classrooms with the aid of colleague and student feedback, and because of the fact that no one has yet identified precisely what effective teachers actually do, this task was not completed. Nevertheless, a number of behavioural objectives were generated, and a small sample is provided here.

Participants will be able to :

- i) Select the classroom environment instrument most appropriate to their needs (desired output 1 i));
- ii) Administer the selected instrument to their classes (desired output 1 i));
- iii) Score student responses to the instrument (desired output 1 i));
- iv) Identify discrepancies between student-actual and student-preferred responses on each dimension for each student (desired output 1 ii));
- v) Devise strategies to increase student sense of affiliation in the classroom (desired output 1 iii));
- vi) Devise strategies to reduce student sense of friction in the classroom (desired output 1 iii));
- vii) Determine the effect of the strategies devised at v) and vi) on classroom environment profiles (desired output 1 v));
- viii) Construct an instrument suitable for recording teacher-created and student-created classroom interruptions (desired output 2)

- ix) Record the distribution of oral questions posed to students in the classroom (desired output 3);
- x) Identify the dominant authority structure in the classroom (desired output 4 i);
- xi) State the procedures for implementing 'Teams-Games-Tournament' (desired output 4);
- xii) Describe the procedures for implementing the Neurological Impress method of peer/cross-age tutoring (desired output 4 iii);
- xiii) Distinguish between 'teacher-owned problems' and 'student-owned problems' from case studies (desired output 5 ii));
- xiv) Calculate student engagement rates (desired output 2 i));
- xv) Devise activities which provide a balance between individual and group activity, personal and culturally defined meanings, and present enjoyment and future utility (desired output 6).

#### EVALUATION

The developers of the program must always be uneasy about the extent of congruence achieved between the behavioural objectives that were generated and the desired outputs of the program. Personal knowledge, experience, imagination and intuition (with all their biases) had to be relied upon to a great extent. At first glance this might appear to be quite unsatisfactory. However, when two

people collaborate closely, pooling their knowledge, experience, imagination and intuition (and perhaps offsetting each other's biases), and both being keenly aware of the need to seek congruence between the elements under consideration, it is likely that many potential discrepancies will be avoided. It is true that other program developers would derive different behavioural objectives. Such behavioural objectives though, may not be better. The key point to be made is that the developers of "Managing the Classroom Environment", having followed the Katz-Morgan strategy, having read widely, and having pooled their resources, were quite satisfied with the decisions they had made.

The program's development had arrived at the stage where the desired products had been identified. Attention was then turned to the desired processes of the program; that is, to those processes likely to effectively and efficiently achieve the desired products. The next chapter is devoted to the search for these processes.

## CHAPTER 4

### THE DESIRED PROCESSES OF THE PROGRAM

The developers of the program maintained that there was little point in identifying desired products without paying close attention to the processes by which these products might be achieved. This chapter contains an extensive overview of relevant theory and research in three areas : 'preconditions for effective change', 'adult learning theories', and 'colleagues working together to improve their teaching'. Following this review, a number of desired process goals and objectives are listed. Three formative evaluation steps are contemplated : the match between process goals and desired outputs, the match between process objectives and process goals, and the match between process objectives and behavioural objectives.

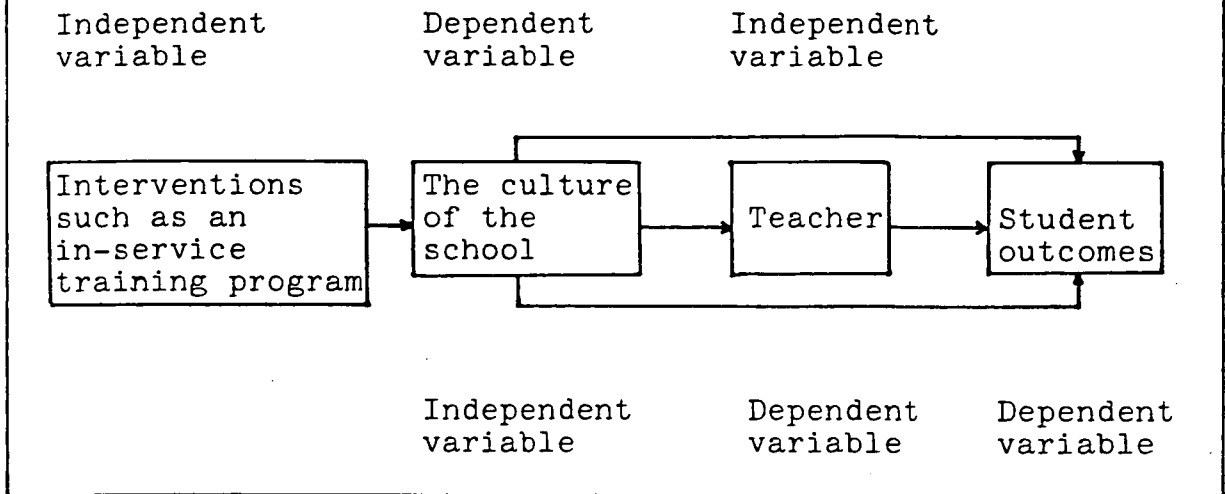
### PRECONDITIONS FOR EFFECTIVE CHANGE

John Goodlad's (1975) paradigm, which is described in Figure 4, continues to provide sound guidance for educational innovators. It is clear that innovations can only change teachers in the desired direction after they have withstood the filtering effects of the culture of the school and/or after changing the nature of this culture.



Figure 4

GOODLAD'S PARADIGM FOR  
IMPROVING SCHOOLING AND LEARNING  
(after Goodlad, 1975, Fig 4, 146)



Urlick and colleagues (1981) identified three important clusters within the school culture, which need to be addressed prior to successful change efforts. These clusters are :

1. AWARENESS, which was seen to be
  - i) "the shared understanding among the staff of a school regarding the range of alternatives in school policies, curriculum, and instructional practices"; and
  - ii) knowledge of "the factors influencing student learning that are subject to control by school staffs and that show significant promise for improving learning."
2. READINESS, which Urlick et al saw as "a composite of feelings, opinions, beliefs and attitudes that the staff of a school has about that school, about other staff members, and about their own roles in that school."

3. COMMITMENT, which in this context refers to the "willingness or agreement of staff members to participate in ... staff development", and which has at least two components :

- i) "the level of intensity of involvement that is acceptable among the staff"; and
- ii) "the participation of school staffs in specifying plans for ... staff development."

To these clusters of preconditions for effective change, Richard Bates (1982) would add the nature of 'myths', 'metaphors' and 'language of negotiation' that pervade any school's culture.

Wood and his associates (1982) proposed an 'RPTIM Model' of staff development, which contained thirty five steps within five stages : Readiness, Planning, Training, Implementation, Maintenance. The first two of these stages are in sympathy with the preconditions outlined by Urick et al above.

The portrayals of 'Jim' and 'David' by Ingvarson and Greenway (1984), provide a rich indication of the large variety of elements (including school, parents, professional associations, school principal, education department, perceived control, personal contacts) which might determine a teacher's perception of himself, his job, his students, his colleagues and so on. Clearly, 'I as teacher' differs for each individual, and no in-service program can, or should attempt to, impact equally on all participants.

It is difficult to dispute the claim by Ingvarson and Greenway (1984, 46) that

... professional development is an individual process influenced more pervasively by administrative and contextual features of the particular educational system within which teachers work, than by the particular forms of in-service education available.

These researchers maintained that we frequently underestimate the filtering effect that the culture of teachers can have on innovations and change efforts. In particular, they saw this culture being characterised by

... concern with status, anxieties about expertise and competence, and a powerful cult of individualism or 'live and let live'....  
(Ingvarson and Greenway, 1984, 46)

Further, Doyle and Ponder (cited by Ingvarson and Greenway, 1984, 48) have put forward three criteria

... which teachers appear to bring to bear in evaluating the perceived attributes of innovations : instrumentality, congruence, and cost.

A final aspect to be touched upon under the umbrella of preconditions for effective change is that of leadership, including supervision. Change does not 'happen' in schools, it needs to be 'engineered', and a 'change agent' needs to lead the process. This change agent will frequently be the school principal, but if he is not, he must be at least sympathetic to change efforts and supportive of them. There are a number of powerful perspectives on leadership processes and functions, including those of Sergiovanni and Starratt (1979), Sergiovanni's (1982) '10-P Model', Squires and his

associates (1983), and Daniel Duke (1982). A perusal of these perspectives will leave the reader in no doubt of the centrality of school leaders in school change efforts, including staff development.

#### ADULT LEARNING THEORIES

The relevant literature provides a number of valuable insights into how adults learn and transfer that learning to the workplace. A sample of these is overviewed here.

Smyth (1984a, 27-28) reported contributions by Willie and Howey who maintained that adults, increasingly, SEARCH FOR INTIMACY, in that they seek to confide in colleagues without fear of ridicule or reprisal, and hope to gain a position of give-and-take and mutual trust. Similarly, Willie and Howey were seen to advocate that adults seek an INTERACTION WITH LIFE'S WORK and consequent self-esteem in their work-a-day lives. Further, they stressed that adults frequently embark on a QUEST FOR MEANING in what they do. As a result of these perspectives, Smyth (1984a, 28) held that

adults, and indeed teachers, learn by doing and benefit most from those activities that combine ACTION and REFLECTION.

Wood and Thompson (1980) listed eleven generalities about how adults learn, and they claimed that these were widely accepted. These are displayed in Figure 5, and a limited number are elaborated upon below. Closely related to the fifth observation, there appears to be considerable evidence that adult learners in any group are likely to be at different levels of personal development. Wilsey and

Figure 5

THE WAYS IN WHICH ADULTS LEARN  
(after Wood and Thompson, 1980, 376)

1. Adults will commit to learning something when the goals of inservice are considered realistic and important to the learner - job related and immediately useful.
2. Adults will learn, retain and use what they perceive to be relevant to their personal and professional needs.
3. Adults need to have accurate feedback about their progress toward their goals.
4. Adult learning is ego-involved and a positive or negative self-concept may result and anxiety may follow.
5. Individualisation is appropriate since adults have a wide range of previous experiences.
6. Adults want to be origins of their own learning and to be involved in selection of objectives, content, activities and assessment.
7. Adults will resist learning situations which they see as an attack on their competence.
8. Adults reject prescriptions by others of their learning, especially when what is being prescribed is viewed as an attack on what they are currently doing.
9. Adult learning is motivated by both lower order and higher order needs.
10. Motivation is produced by the adult learner; all that can be done is encourage and create conditions which will nurture what already exists in an adult.
11. Adult learning is enhanced by behaviours and inservice that demonstrate respect, trust and concern for the learner.

and Killion (1982) developed an orientation characterised by four stages of adult development and four training structures which are likely, respectively, to be congruent with each stage. For example, when adult learners are at a 'right-wrong' stage of development, Wilsey and Killion advocated a highly structured learning environment within which practical information emphasises what to do, how to do it, and the circumstances in which it should be done, where modelling and demonstrations are offered, where theory and generalisations are avoided, and where feedback is directive. At the other end of the spectrum though, where adults are able to synthesise information, create extra categories, approach problems in a systematic way and make spontaneous decisions, Wilsey and Killion held that the desired approach is to allow adults to select topics of personal interest, generate their own goals and standards, to take opportunities for critical and creative thinking, and to provide non-directive feedback.

The recommendations of Richard de Charms have considerable relevance to the sixth factor presented in Figure 5. de Charms (see for example Maehr and Willig, 1982, 118; Brennan, 1982, 53) emphasised the need for people to perceive that they have a degree of control over an outcome, and a degree of responsibility for that outcome. In other words, de Charms saw the need for people to be treated as, or helped to become, 'origins' rather than 'pawns'. This view is not inconsistent with the stages-structure approach advocated by Wilsey and Killion.

Wood and Thompson, however, went beyond their eleven 'accepted generalities' to add that

... adults prefer to learn in informal learning situations where social interactions can take place among the learners. This implies the need to plan inservice that occurs in the normal work setting. (1980, 376)

They also added the finding that

... it appears that a higher proportion of adults than formerly thought may be operating at what Piaget calls the concrete operational stage rather than formal operations stage of intellectual development. This suggests that direct and concrete experiences where the learner applies what is being learned are an essential ingredient for inservice education. Abstract, word-oriented talk sessions are not adequate to change behaviours. (Wood and Thompson, 1980, 376)

It seems that recent learning styles research has particular relevance here. Dunn and her colleagues maintained that

We can no longer afford to assume that all students will learn through whichever strategy the teacher prefers to use. (Dunn et al, 1981, 372)

Dunn reported research by Farr and by Domino who held that college students

... could accurately predict the modality in which they would demonstrate superior learning performance, [and that] the students who had been exposed to a teaching style consonant with the ways they BELIEVED they learned scored higher on tests, fact knowledge, attitude and efficiency of work than those who had been taught in a manner disconsonant with their orientations. (Dunn, 1983, 60)

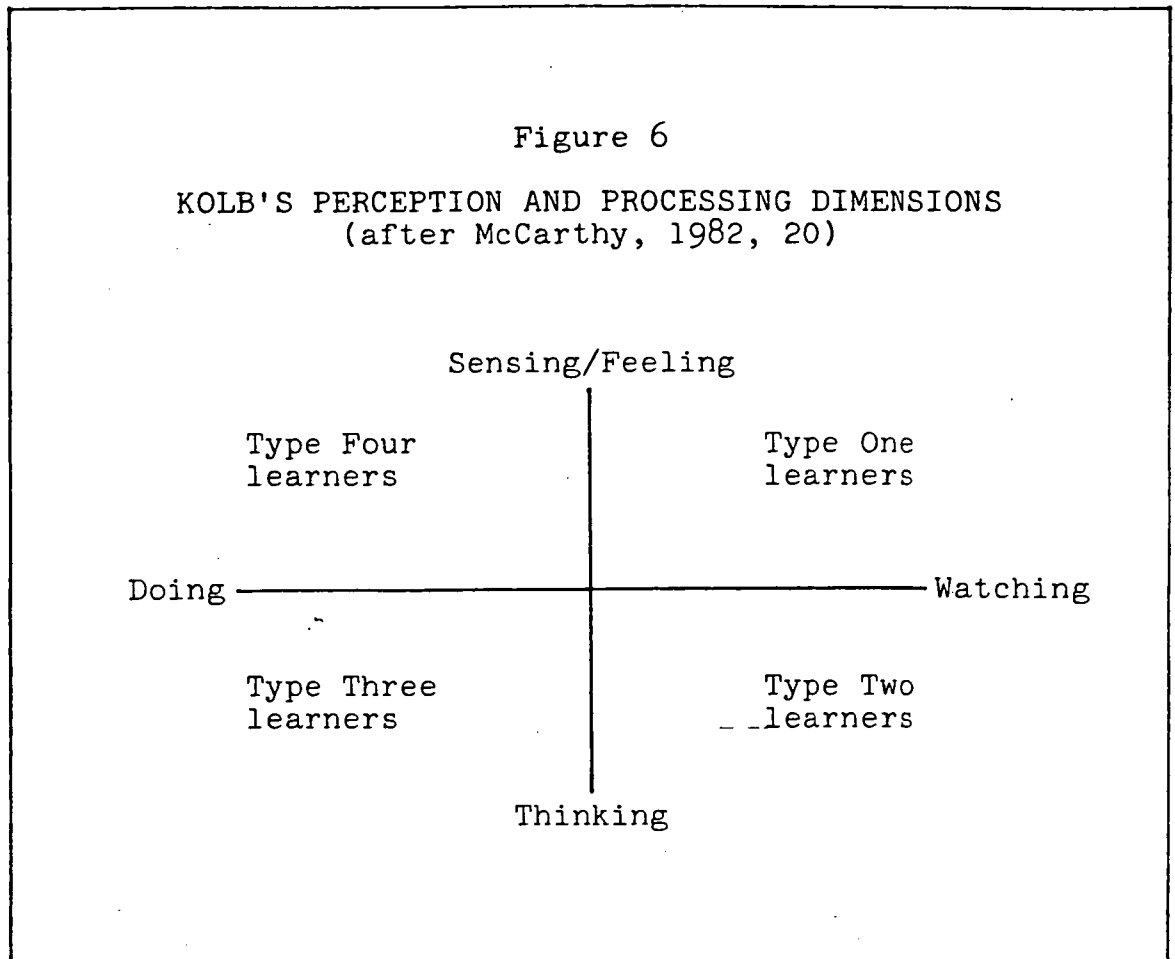
The literature in this area is far from unanimous in agreement on the definition of learning style, the ways in which it might be assessed, or implications for the learning environment. Dunn and her colleagues (1981, 374-375), for example, compared the approaches to these questions by eight individual or groups of researchers. One of these approaches, that of David Kolb, is described in some detail here.

Kolb held that

Learning style is the result of hereditary equipment, past experience, and the demands of the present environment combining to produce individual orientations that give differential emphasis to the four basic learning modes postulated in experiential learning theory. (Dunn et al, 1981, 375)

McCarthy (1982, 20) provided a clear synthesis of Kolb's 'four basic learning modes', and this is briefly summarised below. In our perception of things/events, we either think first or sense/feel first. Then, after perceiving, we process by either watching/reflecting or by jumping in and doing. These two dimensions allowed Kolb to identify the four learning styles indicated in Figure 6. It is postulated that Type One learners seek 'personal meaning', and learn best through discussion and interaction methods; that Type Two learners seek 'knowledge' and learn best through informational (lecture) methods; that Type Three learners seek ways of 'applying knowledge to their own situations', and learn best through coaching methods; and that Type Four learners seek 'hidden possibilities', and learn best through self-discovery, experimental methods.





Given these differences, McCarthy (1982, 22) and Kolb (cited by Dunn et al, 1981, 375) recommended that program leaders should ensure that each basic learning style is catered to for approximately twenty five percent of the time. Such an approach appears to be possible in most situations, will allow each learner to excel for at least twenty five percent of the time, and also develop his non-dominant orientations as well.

The literature is liberally sprinkled with reports of left hemisphere - right hemisphere brain research and of its implications for teaching and learning. It appears that each of the two hemispheres has special roles to play in the learning process, and it is suggested that the method

of INTRODUCING material to learners may be significant. The sequencing of activities such as discussion, lectures, coaching and experimentation, therefore, should be varied as each new area is introduced.

Levy's view is worthwhile quoting at length :

Considerable evidence now suggests that the right hemisphere plays a special role in emotion and in general activation and arousal functions. If this is so, if a student can be EMOTIONALLY ENGAGED, AROUSED, and ALERTED, both sides of the brain will participate in the educational process regardless of the subject matter. With maximum facilitation of both hemispheres, the result will be an integrative synthesis of the specialized abilities of the left and right into a full, rich, and deep understanding that is different from and more than the biased and limited perspectives of either side of the brain. (Levy, 1983, 70)

There is little sense in teachers learning in an in-service program unless they are able and willing to transfer that learning to the classroom/school situation. Several aspects of transfer of learning are investigated in the succeeding paragraphs.

Joyce and Showers (1980, 380) pointed to a range of possible 'levels of impact' of training : awareness; acquisition of concepts/knowledge; learning principles/skills; and application of principles/skills in the natural classroom setting. This view is given further substance by the 'Concerns-Based Adoption Model' (CBAM) which was developed by Hall and Loucks from earlier work by Fuller, and which was overviewed by McCarthy (1982). CBAM points to the goal of assisting learners to move through seven

'stages of concern' : from 'awareness' to 'information', and then successively through 'personal', 'management', 'consequence', 'collaboration', and finally to 'refocusing'. McCarthy's (1982, 22) redefinition of the 'stages of concern' seems to be particularly helpful : from 'understanding' to 'internalising', then to 'operationalising' and finally to 'evaluating'.

The ultimate purpose of "Managing the Classroom Environment" required that Joyce and Showers' 'application' level, CBAM's 'consequence' stage, or McCarthy's 'operationalising' stage, must be the MINIMUM transfer goals. Ideally, however, the program should attempt to move participants through to the 'collaboration', 'refocusing' and 'evaluation' stages. This, though, is no easy task.

Joyce and Showers (1981, 168) cited Ellis' summary of some of the major principles of successful transfer. These principles are presented in Figure 7.

Drawing on material such as that surveyed here, Joyce and Showers (1980, 380) proposed that, wherever possible, a program such as the one being considered should include five components :

1. PRESENTATION of theory, skill or strategy;
2. MODELLING or DEMONSTRATION of skills or models of teaching;
3. PRACTICE in simulated and classroom settings;
4. Structured and open-ended FEEDBACK; and
5. COACHING for application.

Figure 7

PRINCIPLES OF SKILL TRANSFER

(after Ellis, cited by Joyce and Showers, 1981, 168)

1. Overall task similarity. Transfer is greatest when training conditions are similar to those of the natural classroom.
2. Practice and transfer. a) Learning to learn : cumulative practice in learning a series of related tasks leads to increased facility in learning how to learn. b) Early-task learning : transfer is maximised if greater effort is spent on mastering the early tasks in a series. c) Amount of practice on the original task : the greater the amount of practice on the original task, the greater the likelihood of positive transfer.
3. Task or stimulus variety. In general, variety of tasks, or of their stimulus components, during original learning increases the amount of positive transfer.
4. Understanding and transfer. Transfer is greater if the learner understands the general rules or principles which are appropriate in solving new problems.

The fifth component of Joyce and Showers' scheme presented on Page 56, coaching for application, deserves special mention, and provides part of the rationale for the following section.

TEACHERS AS COLLEAGUES  
WORKING TOGETHER  
TO IMPROVE THEIR TEACHING

It is time to turn to the last of the elements presented in the model of effective in-service training programs in Figure 1. The perspectives introduced in the previous sections indicate that learning and transferring new knowledge, skills or attitudes may not be an easy task for many adults. Added to this is the fact that teachers, typically, work in an environment populated by children rather than other adults. Further, classroom life is highly complex and fluid, and as a result classroom realities may not always equate with the intents or observations of even the most keen, qualified, experienced or observant teachers. It can be argued that teachers need assistance in their change efforts.

Berlak and Berlak (cited by Smyth, 1984a, 28) held that "we have some evidence that teachers learn their craft largely from one another." Speiker (1978, 258) held similar views. He said that

... findings of social psychology suggest that people with similar interests can, through interaction, contribute to one another's welfare. Programs of professional growth should take advantage of teachers' potential for teaching one another.  
(Speiker, 1978, 258)

Recall the emphasis Joyce and Showers placed on 'coaching for application'. These researchers (1982, 6) listed five major functions of coaches :

1. Provision of companionship which promotes reflection, checking perceptions, sharing frustrations and the like;
2. Giving technical feedback;
3. Analysis of the application of the skill/technique;
4. 'Reading' student reactions to enable the teacher to adapt his new learnings to his students; and
5. Reduce the teacher's sense of isolation and raise his perceptions of the amount of support he is receiving.

The coaching functions seem to fit rather well with four elements of adult learning identified by Sprinthall and Sprinthall (1980) :

1. Adults need to have role-taking experience in which they become actively involved in new and more complex interpersonal tasks;
2. They need to adopt new role expectations through an experiential process;
3. Adults need to be guided in their reflection upon their experiences;
4. Adults, despite their adulthood, require careful and on-going support in their attempts to change their behaviours.

Another view was offered by Smyth (1984a) as a result of his review of studies made by McNergney and Carrier. The recommendation was that teacher development be PERSONALISED, in that it should recognise the particular needs and abilities of teachers concerned, and that it should recognise the INTERACTIVE effects of teacher characteristics, behaviour, learning tasks and learning environments. Further, Smyth stressed that the McNergney and

Carrier model emphasised PRACTICALITY and RECIPROCITY, within a context of the individual's DEVELOPMENT NEEDS and the CONTEMPORARY ISSUES he is expected to come to grips with in his professional life.

There seems no doubt that, in the Tasmanian setting at least, identified 'supervisors' cannot satisfy the requirements that emerge from this discussion. There appear to be at least two (complementary) alternatives. Teachers can seek the support and feedback of their students. This report indicates, in places, that student input need not be inconsiderable. Nevertheless, colleagues cannot be denied their potential for assisting each other to reflect upon their teaching practices and in acting as coaches in a collegial fashion. This is the second alternative. One of John Smyth's persuasive passages is worthwhile repeating here at length :

... teachers' own interpretations and theories about what works in classrooms CAN and SHOULD constitute the basis of change strategies in schools. In themselves, teachers have the capacity to engage in practical reflection through the development of collaborative alliances that not only enrich their sense of what is feasible and possible, but has the potential to transform as well their understanding of those realities. In initiating and carrying out this process of critical reflection about their own teaching, teachers clearly require various forms of assistance. The suggestion offered here is that one important way in which this might occur is through ... 'clinical supervision'. (Smyth, 1984a, 24)

The clinical supervision processes that have emerged from the Goldhammer (1969) and Cogan (1973) model adhere to a democratic spirit and offer a structured methodology

which may, with experience, training and support, provide teachers with a tool which will allow them to assist colleagues, as well as themselves, to investigate the complexities of the classroom and to change their behaviours where necessary. The rationale, form, roles, and skills of clinical supervision have been thoroughly overviewed by Turney and his colleagues in a handbook and accompanying video tapes (1982), and by Smyth (1984).

To conclude this rather long and involved literature review, it might be appropriate to provide the highlights of Mazzairella's (1980) synthesis of research on staff development which was written for ERIC Clearinghouse on Educational Management. It provides an excellent summary of many of the perspectives touched upon in the text, and is displayed in Figure 8.

The views that have emerged in this chapter to this point provided the developers of the program with the bases for their process goals and objectives selection. These goals and objectives are presented in the next section.



Figure 8

FEATURES OF EFFECTIVE  
STAFF DEVELOPMENT PROGRAMS  
(after Mazzarella, 1980)

Effective staff development programs

- . are concrete and aimed at specific skills
- . emphasise demonstrations and practice with feedback being provided
- . are individualised and relate to on-the-job needs of the participants
- . are ongoing - stretching throughout the year
- . are held at school rather than elsewhere
- . include opportunities to observe others who have mastered and are practicing the skills being learned
- . Principals participate and show their knowledge and support
- . teachers help to choose the content of the program and act as helpers and planners
- . the function of training and teacher evaluation are separated

## THE PROGRAM'S PROCESS GOALS AND OBJECTIVES

The literature review that occupied the previous pages of this chapter provided the developers of "Managing the Classroom Environment" with a wealth of recommendations upon which to build their process goals. As each recommendation passed the test of congruence with the desired outputs of the program, it was subjected to another test. This test was concerned with the possibility of satisfying the process goal, given the limited resources and jurisdiction of the program. Two fields of study, in particular, fell foul of these caveats.

The perspectives of Goodlad, Urick, Bates, Wood, Ingvarson and Greenway, Hargreaves, and Doyle and Ponder, were appealing to the program's developers. Nevertheless, they were forced to ASSUME that the teachers and the schools were ready for change, and that the in-service program would be aligned with each school's existing staff development program. In other words, this program could contribute to no more than the third stage of Wood's model : The Training Stage. No educationalist could ever be entirely comfortable with this assumption, but the assumption had to be made. If "Managing the Classroom Environment" is ultimately judged to be worthwhile and of merit, the assumption must have been valid. Indeed, such success may very well be due to the existence of favourable elements in the cultures of the schools. Similarly, though, if the program is judged to have failed in satisfying its ultimate purpose, a share of the blame might be attributed

to school deficiencies rather than to the program within its limited boundaries. The important point to be made here is that no in-service training program (or indeed any change initiative) can hope to be successful unless the school is ready for it and has planned adequately for its adoption. The fact that the initiative for the program emanated from a number of teachers within several of the relevant schools, and that school Principals, once having an insight into the program's purpose, goals and objectives, could either ignore or accept the invitation for their school to participate, reduced some of the uneasiness felt by the program's developers.

The second field of study to be affected by the feasibility test was that concerned with stages of adult development as outlined by Wilsey and Killion (see Page 50). More or less structure should have been aimed for with different participants, but this was seen to be beyond the resources available.

Ten process goals were established. These are stated below. In addition, a sample of the supporting and illuminating process objectives are provided. The reader will be assisted by the way the process objectives are displayed under the process goals to which they are aligned. It is anticipated that the reader will be able to make his own cross references between the goals and objectives on the one hand, and the supporting literature review on the other.

The program should

1. be ongoing throughout the year;
  - i) participants should attend a series of workshops;
  - ii) participants should be equipped with skills to allow them to practice clinical supervision with a colleague in the school setting.
2. take place in an informal setting where there is considerable opportunity for interaction between colleagues;
  - i) workshops should allow for considerable guided and unguided discussion and conversation;
  - ii) participants should be encouraged to share their new skills and knowledge with their colleagues at school.
3. allow for active, hands-on, concrete experiences in areas relevant to the participants' needs;
  - i) participants should practise skills in their own classrooms and obtain feedback from a colleague and from students.
4. provide opportunities for modelling, demonstrations, observations, lectures, discussions, experimentation, practice and coaching, and these should be rotated in their use as far as possible;
  - i) participants should view and discuss video tapes of teaching segments;
  - ii) participants should take part in video taped micro-teaching sessions.

5. encourage participants to share in the planning and delivery of the program and provision should be made for choices in content and process;
  - i) program leaders should set aside one segment of each workshop to allow participants to discuss content to be introduced and process to be employed during the next workshop.
6. ensure that feedback is given in a collaborative, non-directed manner and that it is divorced from evaluation for promotion, tenure and so on;
  - i) participants should enter the program in pairs;
  - ii) participants should demonstrate essential skills in clinical supervision.
7. provide for colleagues to work together and for them to be trained as coaches who can provide companionship and feedback to each other;
  - i) participants should gather, develop, and practise the use of a number of devices appropriate to record teacher behaviours in the classroom.
8. be non-threatening to participants, but it should not be so sterile that all challenge is eliminated;
  - i) participants should report informally to the group on their successes/failures as a result of the initiatives taken by them in their classrooms;
  - ii) participants should be offered credit towards a further formal qualification as a result of their work in the program.

9. should be delivered in an imaginative manner in order to engage the emotions of participants;
  - i) appropriate guest speakers should be invited to address the group;
  - ii) leaders should select and use appropriate instructional technology;
  - iii) role plays and demonstrations should be employed.
10. involve school principals and other supervisory personnel;
  - i) principals should be invited to attend and participate in workshop sessions.

#### EVALUATION

It has been pointed out that the program's developers, given their knowledge of the supporting literature, their experience, intuition, imagination and biases, attempted to ensure that the process goals were congruent with the desired outputs of the program and that they were feasible to adhere to. These developers were convinced that Step 4 of the Katz-Morgan strategy was well satisfied.

At Steps 5 and 6 of the strategy, however, the program's developers found the literature to be much less helpful. Process objectives were to be sought which would effectively and efficiently lead to the satisfaction of the process goals and behavioural objectives. Several examples will illustrate the difficulties encountered.

The developers of the program were convinced that the program should be ongoing throughout the year (process goal 1) but they could not find any evidence to support the process

objective which called for participants to attend a series of workshops (with tertiary educators as leaders and in an off-school setting). Similarly, no evidence could be found to support the view that "participants should view and discuss video tapes of teaching segments" (process objective 4. i)) was congruent with the process goal (4) which pointed to the need for "modelling, demonstrations, observations...." On the other hand, at Step 5, the process objective 6. i) which called for participants to enter the program in pairs, appears to be well supported in the literature as a means of achieving the process goal (6) that the program should "ensure that feedback is given in a collaborative, non-directed manner...."

Despite all its obvious limitations, the process of tentative selection - assess - abandon - adopt, assisted the developers of the program to make THEIR decisions, and to ultimately derive process goals and objectives with which THEY were satisfied. Many of these process goals and objectives seem to overlap and reinforce each other, especially in the area of colleagues working together, and this was judged to be another strength of the program.

The program's developers were now ready to take their program to a group of participants. They had formulated desired products which they believed would lead to higher quality learning among the students of those participants and of their colleagues, and they had also decided upon the desired processes which they thought would effectively and efficiently lead to the satisfaction of the desired products.

CHAPTER 5  
THE PROGRAM IN ITS IMPLEMENTATION :  
OBSERVED PROCESSES

This chapter offers a brief description of the processes that were observed to take place during the program, and contemplates the degree of congruence between these processes and the desired ones in accordance with the seventh step in the Katz-Morgan strategy.

The program was conducted in a series of workshops and in the schools of the participants. Workshops were held on eight rather than the intended ten days. This was due to the fact that the schools of the participants had exhausted their sources of funding for day relief. Twelve participants attended the first three day and the next two day series, ten attended the sixth day (one school having already exhausted its funding), while seven attended the final two days (one having gone overseas to read towards a higher degree, and two being involved in other school activities). The two program leaders participated in all workshop sessions. Each workshop day was characterised by a full program, and overall, the leaders and the participants shared approximately equally in the delivery.

The facilities offered by the Teachers Centre were excellent (three appropriately furnished rooms, overhead projectors, video recorder and monitor, lounge and refreshment facilities), although a video camera was not readily available, and alternative accommodation had to be sought when using U-matic format video tapes.



A wide range of activities characterised the workshops - lectures, guided discussion, demonstrations, video tape viewing, a guest speaker, role plays, case study analysis, conversation, oral reports - and these activities were reasonably well distributed throughout each day and rotated in their use. These activities enabled the group to focus on a number of content areas :

- . The origins, and intents of the program;
- . The rationale, form, and roles of clinical supervision as practiced by colleagues, together with a selection of appropriate skills;
- . A conceptualisation of the psychosocial environment of the classroom, an orientation to a number of instruments which can be used to assess student perceptions of their actual and preferred environment, a strategy which is expected to be effective in 'engineering' the classroom environment (each participant was given a manual to assist in this task, and each was offered a supply of the relevant instruments);
- . The notion of school climate and an instrument to assess teachers' perceptions of their actual and preferred work environment (the Work Environment Scale), together with an overview of Tasmanian means in these areas;
- . The nature of a 'human curriculum' as conceived by Sergiovanni and Starratt (1979), and possible strategies to bring about the desired balance between the components;
- . Thomas Good's (1981) model of the likely effects of teacher expectations on student performance and behaviour, and an overview of Good's observations of how teachers frequently communicate their expectations to students;

- . The nature and potential effects of co-operative learning strategies, including peer and cross-age tutoring, 'Teams-Games-Tournament', 'Jigsaw', on student outcomes;
- . Problems of the Grade 6 - 7 transition, and possible solutions;
- . The reinforcement skill in teaching;
- . David Berliner's (1983) image of 'Teachers as Executive Managers';
- . Classroom discipline, with special emphasis on the perspectives of Gordon (1979), Spaulding (1983a, 1983b) and Balson (1984), and a coverage of a Victorian school's experiment with Glasser's approach (Wildenberg and Simpson, 1984);
- . Classroom management as overviewed by Emmer and Evertson (1981)
- . The effective use of time in the classroom;
- . The development and use of classroom observation instruments as envisaged by, for example, Good and Brophy (1984) and Turney et al (1982);
- . Teaching a skill to students.

Time was allocated during each workshop day to discuss and decide upon the content and process to be employed in succeeding sessions, and while many of the areas of content and processes were suggested by the leaders, participants did take the opportunity to suggest topics of interest to them and processes they thought most appropriate.

While participants, generally, revealed increased dialogue with colleagues and students on aspects of the classroom and student learning, only one adopted clinical

supervision practices to any marked extent.

All classroom teachers in the group surveyed student perceptions of their classroom environment in at least one class. In addition, many of these introduced colleagues to the instruments, who in turn used them in their classrooms. In most cases, participants consulted colleagues in their attempts to change the classroom environment in the required direction.

Following his participation in most workshop activities, a High School Principal shared much of the content with a number of teachers in his school. Senior personnel, including Principals, in other schools became involved in the program to the extent that they willingly and openly participated in school climate surveys and discussions when requested. Otherwise, informal workshop discussion revealed that such personnel generally demonstrated an interest in the workshops and resultant classroom/school initiatives, but that they did not normally become involved in them.

The program was ongoing throughout the year for at least eight of the participants.

#### EVALUATION

At the outset of the program, the participants were given a list of process goals and objectives, the list was discussed, and an invitation was offered to the effect that participants should advise the leaders if they thought the process goals were not being satisfied as the program progressed. This invitation generated a number of responses

which, in turn, caused the leaders to modify the processes where possible. In particular, the objective "participants should take part in video taped micro-teaching sessions" was abandoned as a result of expressed sentiments that such sessions might be too threatening at that stage. Further, a number of suggestions by participants resulted in changes in groupings and seating arrangements during workshops in order to better satisfy the process objective that "workshops should allow for considerable guided and unguided discussion and conversation".

Near the mid-point of the program, participants completed a questionnaire which contained thirteen specific questions requiring a ticked response along a seven segment 'very much so - not at all' scale. This part of the instrument was scored by coding the responses 7 ... 1. In addition, participants were invited to comment upon their ticked response to each of these questions, and they were also asked to make a general comment about the program's actual processes if they wished. The leaders of the program make no claims about the validity, reliability, and so on of the instrument, but maintain that it assisted them in their formative evaluation of the program. The questionnaire and the quantitative data it generated are summarised in Figure 9.

The data displayed in Figure 9, together with the supporting qualitative data, caused the leaders of the program to believe that the process goals and objectives were being reasonably well satisfied in all areas except two. Responses to questions 2 and 13, quite clearly, indicated

Figure 9

THE QUANTITATIVE RESULTS OF A QUESTIONNAIRE  
TO ASSESS THE DEGREE TO WHICH THE PROCESS GOALS  
AND OBJECTIVES WERE BEING SATISFIED  
(scale 7 - 1)

	Mean response	Most common response
1. To what extent has the program provided you with material to take back to your school to share with your colleagues?	6	6
2. To what extent have you been able to practice clinical supervision with a colleague in your school setting?	2	1
3. To what extent have the program leaders encouraged formal and informal discussion during the workshops?	6	7
4. To what extent has the program enabled you to share new skills and knowledge with your colleagues?	5	5
5. To what extent has the program provided you with active, hands-on, direct and concrete experiences relevant to your purposes?	4	4
6. To what extent has the program enabled you to obtain feedback about your teaching behaviours?	4.5	4
7. To what extent has the program satisfied your need for variety in presentation?	4	4
8. To what extent has the program made appropriate use of instructional media?	4	5
9. To what extent have you been encouraged to share in the planning of the program?	4.5	5
10. To what extent has feedback been given in a collaborative, non-directed manner?	5	6
11. To what extent has the program been non-threatening to you?	6	6
12. To what extent has the program been delivered in an imaginative manner?	4	5
13. To what extent have supervisory personnel in your school been involved in the program?	3	1

that there were deficiencies of considerable magnitude in both the adoption of clinical supervision among colleagues, and in the degree of involvement of Principals and other school supervisory personnel in the program.

Collegial clinical supervision was not being adopted by the participants to any marked extent. Written comments in this area included :

"Time a problem, and finding free lessons."

"Able, but just haven't to this stage."

"Reluctant to comment on each other's style."

"Became involved in other things in the program."

A second questionnaire focused more closely upon possible reasons for minimal adoption of clinical supervision practices among colleagues. Each item in this questionnaire was drawn directly from the literature, but, again, no claims can be made about its validity or reliability. Nevertheless, it revealed that two participants had engaged in the practice 'occasionally', while the remainder 'not at all'.

The three most important reasons offered by the respondents, in order of importance, were :

"A Lack of time in your work-a-day life"

"Logistical problems (e.g., timetable, rooming)  
of implementation"

"A lack of a supportive, professional growth  
school environment"

All respondents indicated a lack of time as a reason of the magnitude "To a very great extent", while two indicated that it was the only reason. All but one of the other respondents claimed that logistical problems were important or very important. No participant indicated that "A lack of commitment to improving your teaching competence" was an important reason, but all other factors were rated as being important by at least one participant. However, "Not at all" was the most common response to the following questions :

A lack of training/experience in a problem-solving mode with peers?

Your school's cellular (departmental) structure?

A lack of analytical ability on your part?

A lack of ability for you to operate at a highly abstract level?

A lack of commitment to helping colleagues improve their teaching competence?

Isolation/fragmentation caused by your schools' architecture?

The 'pecking order' of personnel within your school?

An expectation for you to adhere to standardised/ 'correct' practices in your lesson planning, delivery and evaluation?

A reluctance on your part to accept the recommendation that peer clinical supervision is, potentially, a potent tool to improve the effectiveness of your teaching and that of your colleagues?

An inability to accept a peer's presence in your classroom?

A number of written comments also provided valuable input here :

"A good idea, impractical in many cases due to situations, and one is probably left to one's own devices...."

"I was very interested in the idea of clinical supervision, but both parties have to make a lot of time available and show commitment to the idea. I wish we had been able to work it better, because I know I would have had to change some of my teaching behaviours, or at least thought more constructively about the problems I experience, and had the objective (not judgemental) help of someone else in developing alternative strategies. I think the model has great potential. In some ways I'd like to see much more time given to it in the course."

"I think it is difficult and probably of little help to ask someone to clinically supervise one's teaching unless you have great respect for the opinions of the supervisor and trust him/her as a person. Sadly, I have little respect for the people that I would be expected to ask."

"I feel that clinical supervision would be very useful and appropriate for class teachers involved with practising students. Not all teachers are receptive to clinical supervision (those under my control)."

An important point, given the centrality of student perceptions in the program, emerged from this second questionnaire. Participants were asked to assess the extent to which they believed students, through their responses to classroom environment questionnaires, provided sufficient feedback on teaching behaviours. A number of respondents maintained that such feedback was a "very important factor" in causing them to refrain from adopting clinical supervision with a colleague, while all but two acknowledged it as being a factor.



Given this information, the leaders of the program decided not to upgrade the program's attention to the rationale/process/ roles/skills of collegial clinical supervision. Eltis and Turney (1983) have demonstrated that teachers can understand the supervisory process and the nature of the feedback role within it, and could gain knowledge of how it play that role, through a six hour program. Nevertheless, it was decided that any payoff in the form of greater participant ENGAGEMENT in the process, ~~given their belief that the barriers to implementation~~ were too great, would not be sufficiently high.

John Smyth (1984, 47-48), one of the strongest advocates of collegial clinical supervision, raised three important questions :

To what extent are the practices of clinical supervision JUST in treating teachers as rational and capable of participating fully in the determination of their own destiny?

To what extent is the process of clinical supervision PRACTICAL in allowing teachers to discover aspects about their own teaching through actions?

To what extent is clinical supervision REALISTIC in acknowledging the facts of school and classroom life?

Unfortunately, Smyth did not offer any answers to these questions; merely further questions to illuminate the main questions. Following this exercise, the leaders of "Managing the Classroom Environment" have considerable doubts that collegial clinical supervision is practical and realistic in the current Tasmanian setting.

In addition to the above reasons, the leaders of the program felt that informal discussions between colleagues and feedback from students might, together, go some way towards offsetting this deficiency in the program's process. Further, it was clear that participants were successfully engaging in a number of activities in an attempt to improve the quality of learning occurring in their classrooms.

The second major deficiency in the observed processes related to the involvement of school Principals and other supervisory personnel in the program. The quantitative data were dismal on this aspect. The written comments, though, indicated that such personnel, generally, were interested and supportive, even though they did not become involved. The leaders of the program decided not to seek additional involvement by Principals and school supervisors during the year.

It is clear that the observed processes were not always congruent with the process objectives. In line with the Katz-Morgan strategy, the process objectives were amended - unfortunately, these amendments did not always strengthen the program. Workshop days were reduced from ten to eight, clinical supervision was eventually thrust into the background, and expectations for senior personnel involvement were weakened. The next chapter pays attention to the observed products of the program - would they be satisfactory despite the deficiencies in the processes that emerged?

## CHAPTER 6

### THE OBSERVED PRODUCTS OF THE PROGRAM

The observed products are discussed at three levels of generality; first the most specific, the attributes of the participants, then the observed outputs, and finally the most general, the observed outcomes. This chapter also follows the final three steps of the Katz-Morgan strategy of formative evaluation.

#### ATTRIBUTES OF PARTICIPANTS

Katz and Morgan (1974, 218) defined the attributes of participants as their actual behaviours in terms of the behavioural objectives. No attempt was made, formally, to test the extent to which actual behaviours of participants matched the behavioural objectives. Instead, the leaders of the program relied upon the artifacts displayed, stated successes and failures, and the nature of the interactions in the workshops. It was here that the presence of two leaders in the workshops was invaluable in the evaluation process. The leaders were able to rotate between them the role of 'active participant' in discussion, presentation and other workshop activities, and the role of 'reader' of participants' reactions, fears, enthusiasm, understanding, difficulties and so on.

The leaders of the program were very satisfied with the efficiency and effectiveness of this process. At no time were they tempted to endanger the process goals and objectives concerned with ensuring that the program was non-threatening to the participants. On several occasions

changes to process objectives were indicated and made. Several examples illustrate the nature of these changes. In order to facilitate an ability to use the co-operative learning strategy "Teams-Games-Tournament", it was planned that a hand-out summary of the strategy, together with a brief explanation of it, would be an efficient and effective process. It became immediately clear, however, that confusion reigned. As a result, a demonstration of the strategy, together with the use of blackboard diagrams and a rearrangement of the furniture in the room to simulate the strategy in action, was hastily arranged, with positive results. Secondly, given the belief that groups of teachers can be imaginative in the generation of solutions to problems, it was planned that several workshop sessions should be devoted to 'brainstorming' activities to generate possible strategies to eliminate actual-preferred discrepancies in classroom environment profiles. Further, given the fact that the instruments available to assess these perceptions of the environment are recommended for use in either Secondary or Primary classrooms, but not both, it was proposed that the group divide into two sub-groups on this basis. Participants, however, were quite vocal in their 'demand' that each sub-group should be characterised by a Primary-Secondary mix. This demand was promptly heeded, as it was considered that the relevant behavioural objectives would be more likely attained. Finally, in order to develop an ability among participants to systematically teach a skill, it was proposed that a demonstration would be provided and that the participants would then practise the technique in pairs. Following the demonstration, several participants

volunteered to repeat the demonstration. This they did with smoothness and style. These results, together with the comments of the other participants, persuaded the leaders to cancel the promised practice session.

It will be recalled from Chapter 3 that the task of writing behavioural objectives was not completed. Participants, in collaboration with a colleague, were to establish many of their own objectives and thereby grow and develop in areas they considered important to their professional lives.

It was suggested also, that it is doubtful whether any teacher behaviour, at a specific level, can be decreed to be the best possible one, or indeed, even a desirable one in all circumstances. This latter point deserves further elaboration, by means of an example. It is the firmly held belief, practice and recommendation of many teacher educators (including the present writer), that classroom management matters must be attended to BEFORE academic concerns, and that academic concerns should be suspended UNTIL classroom management problems have been overcome (at least for the time being). In other words, "You can't teach them until you get them down from the rafters and into their seats." This is well supported in the literature (e.g., Emmer and Evertson, 1981). However, an (interim) research report has cast some doubt on this 'wisdom'.

Doyle held that

It seems clear ... that successful [classroom] managers ... when faced with situations which were difficult to manage ... pushed ahead with the activity system and protected it by ignoring misbehaviour and raising their threshold for accepting rule violations. (Doyle, 1984, 274-5)

Doyle described the approach taken by one particular teacher, and while it takes up considerable space it is worthwhile repeating here.

In her Period 4 class, there was a small group of boys who frequently initiated misbehaviour and ignored the teacher's reprimands. Moreover, these students joined one another quickly whenever an incident of misbehaviour began. There was, in other words, a rapid 'spread of effect' for inappropriate and disruptive behaviour. The teacher appeared to respond to this situation by pushing ahead with activities, talking continuously about work, and hovering over seat-work segments. In addition she IGNORED THE MISBEHAVIOUR OF THE SMALL CORE OF DISRUPTIVE STUDENTS AND REPRIMANDED LESS SERIOUS OFFENCES BY STUDENTS WHO WERE MORE LIKELY TO CO-OPERATE. In effect, she focused public attention on activities and protected that system from misbehaviour by excluding the disruptive students and preventing other students from joining their ranks. AND IN THE LONG RUN SHE WAS SUCCESSFUL : the activity system took hold and began to run smoothly. Moreover, the original core of disruptive students eventually became involved in academic work, and ratings on indicators of management success showed improvement. In sum, the teacher was able to turn the situation around - a rare event in teaching - although the process of getting activities started was protracted. (Doyle, 1984, 274) (my emphasis)

It was clear that participants did not, typically, adopt clinical supervision practices. It was judged, therefore, that the quality of the behavioural objectives pursued by the participants was not as high as it might have been. However, just as process objectives and goals are means to an end, so too are behavioural objectives. The leaders of the program were impressed with the quality of more general products of the program.

### THE OBSERVED OUTPUTS OF THE PROGRAM

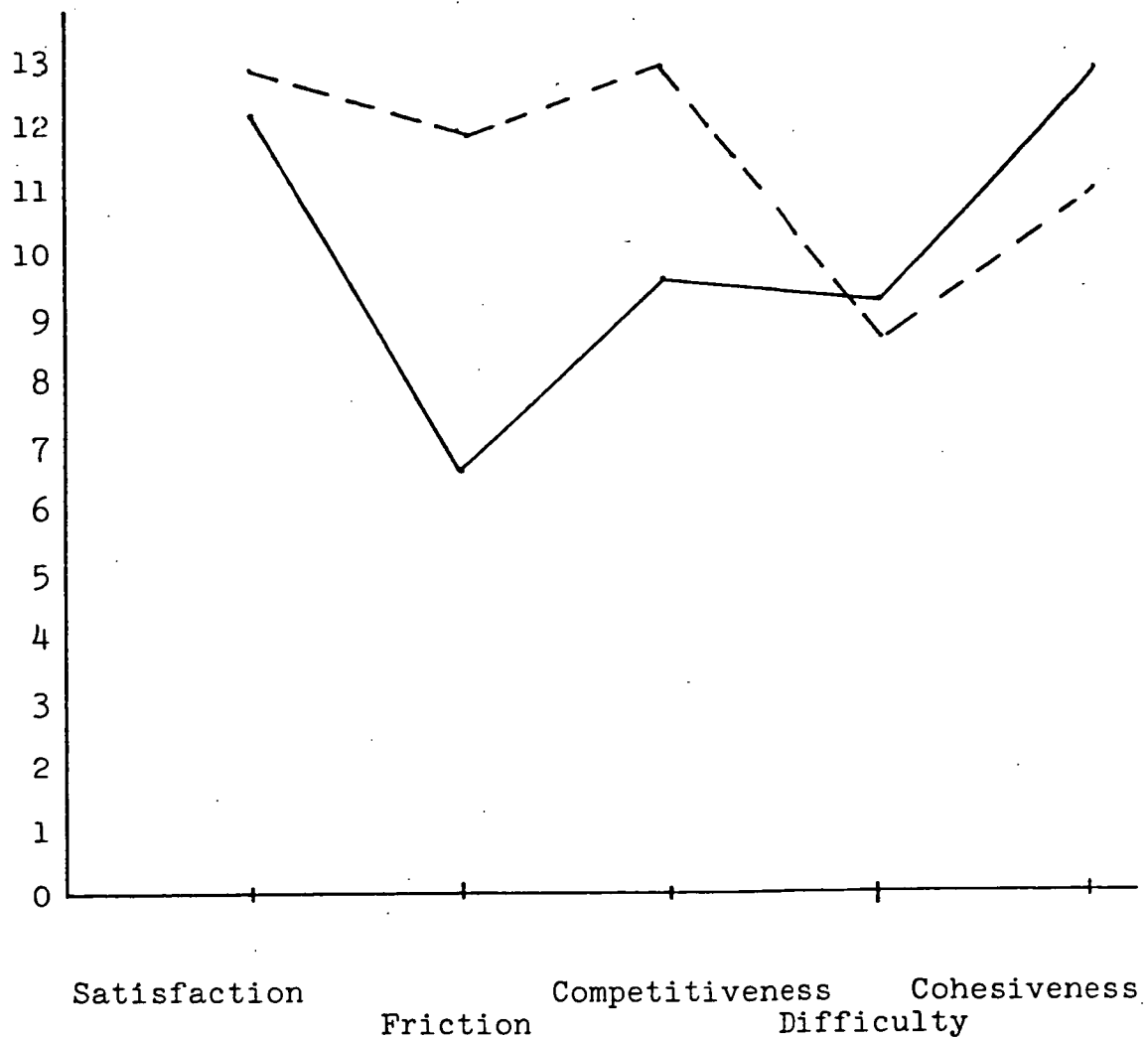
It will be recalled that the outputs of the program were interpreted to be intermediary between general goals and specific behavioural objectives, combining several behavioural objectives together to form stepping stones towards the general goals. A number of these outputs are presented in this section.

It was clear that all participants accepted the recommendation that the quality of student learning could be enhanced if the classroom environment was sympathetic to the preferences of students. All participants demonstrated an ability to administer the appropriate instruments, draw environment profiles, generate strategies to change the environment in the required direction, and to implement these strategies in their classrooms. In addition, many of the participants shared their new-found interest and skill with colleagues, who in turn set about investigating and changing the environment in their classrooms. Several of these initiatives are illustrated here.

The two teachers focused upon here administered the My Class Inventory (short form) to their classes - a composite Grade 4-5 and a Grade 6. The actual and preferred profiles, as revealed by student responses, are presented in Figures 10 and 11. The teachers were each concerned about the size of the discrepancies in both the friction and competitiveness dimensions. A degree of consultation between these two teachers led them to adopt a number of strategies to decrease friction and competitiveness. Class

Figure 10

STUDENT PERCEPTIONS OF THEIR ACTUAL AND  
PREFERRED CLASSROOM ENVIRONMENTS  
AS REVEALED BY THE MY CLASS INVENTORY  
(SHORT FORM) IN A COMPOSITE GRADE 4-5 CLASS



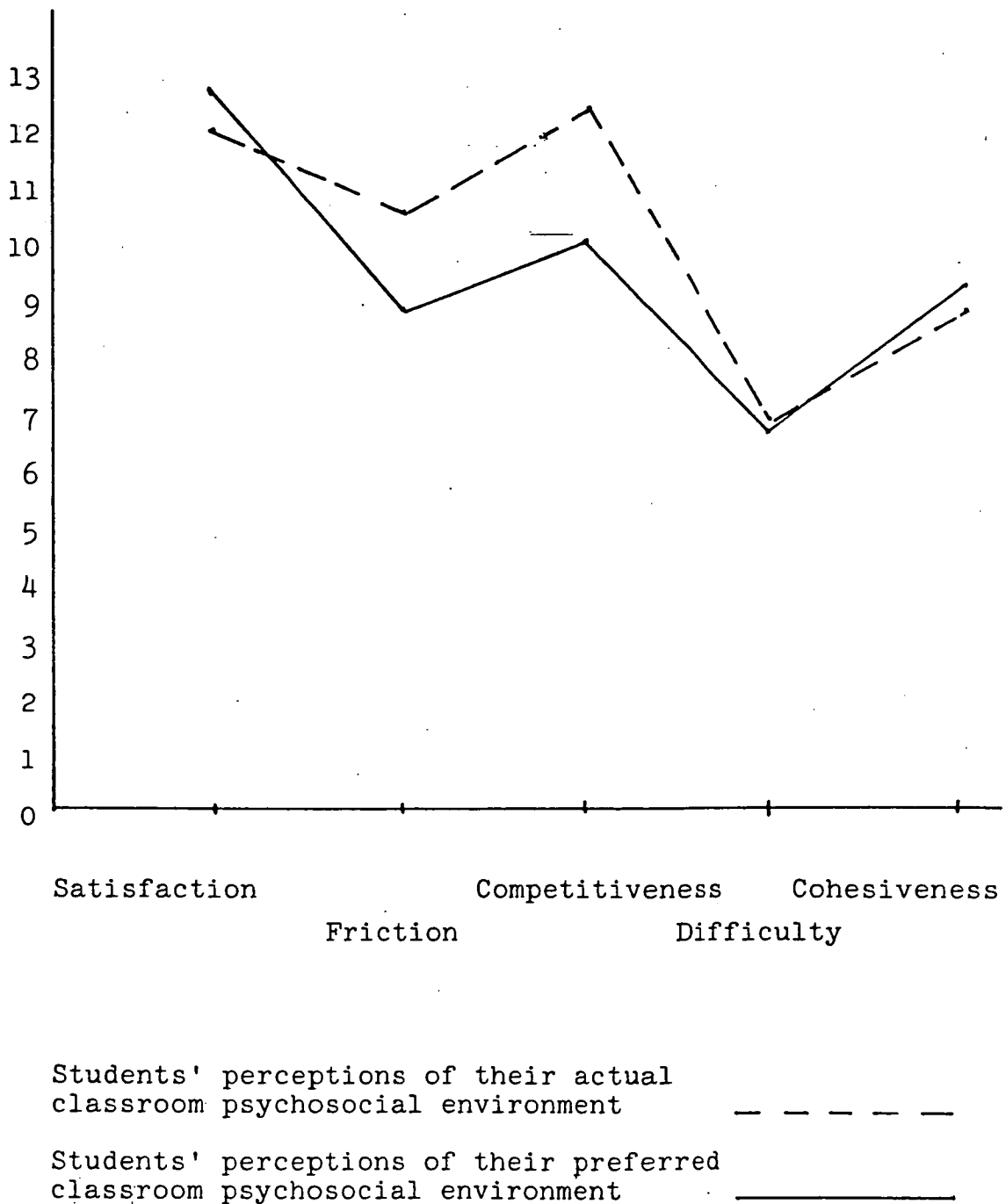
Students' perceptions of their actual  
classroom psychosocial environment — — — —

Students' perceptions of their preferred  
classroom psychosocial environment — — — —



Figure 11

STUDENT PERCEPTIONS OF THEIR ACTUAL AND  
PREFERRED CLASSROOM ENVIRONMENTS  
AS REVEALED BY THE MY CLASS INVENTORY  
(SHORT FORM) IN A GRADE 6 CLASS



mottos, such as "Smile at yourself, smile with others", emerged from class discussion, and these mottos were displayed in each of the classrooms. The teachers allocated time to 'gripe sessions', during which students were encouraged to be frank in discussing social and academic matters which concerned them.

In addition, these two teachers, after discussing the matter among themselves, placed greater emphasis upon co-operative learning strategies. In particular, 'Teams-Games-Tournament' was tried on several occasions. One of the highlights of the workshop feedback sessions was the report by these teachers on the results of this latter activity :

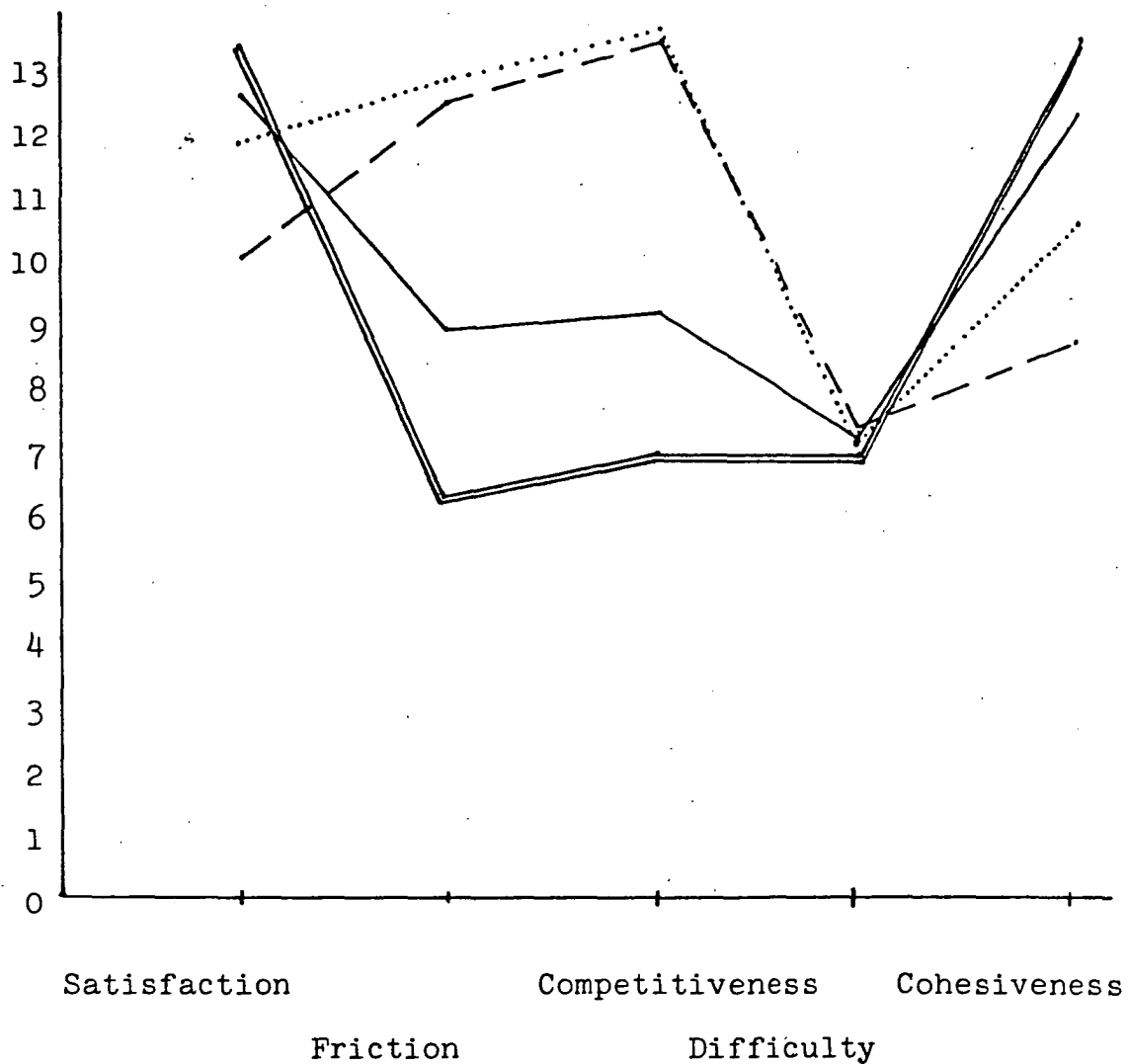
The five groups in each class became quite cohesive. The interteam rivalry became very intense indeed. The kids loved it, but we couldn't stand the pressure.

A number of other teachers in the group volunteered that they had had similar experiences with their classes. One teacher indicated that he had built a 'flashing light board' to simulate "Sale of the Century" conditions during his experiments with 'Teams-Games-Tournament'.

Another teacher reported an interesting application of the My Class inventory (short form) instruments, designed to assess student perceptions of their preferred and actual classroom environments in Primary classrooms, in his school. Two Grade 5 classes were to be amalgamated to form a double unit (in the one large room, with two teachers). The perceptions of the children in one of these classes were assessed before the amalgamation. The resultant profiles are shown in Figure 12. Approximately nine weeks after the amalgamation,

Figure 12

PERCEPTIONS OF STUDENTS IN A GRADE 5 CLASS  
BEFORE AND AFTER THE FORMATION  
OF A SINGLE UNIT  
(as revealed by My Class Inventory, short form)



Students' perceptions of their actual environment  
before amalgamation — — — —

Students' perceptions of their preferred environment  
before amalgamation —————

Students' perceptions of their actual environment  
after amalgamation .....

Students' perceptions of their preferred environment  
after amalgamation =====

the perceptions of the same children were assessed again. These results are displayed in Figure 12 as well. These profiles highlighted the decrease in the children's tolerance for friction and competition and enabled the teachers concerned to focus on these areas in their environment 'engineering' efforts.

Four of the more senior participants in the program encouraged a number of their subordinates to administer the Classroom Environment Scale (short form) to a number of their classes. The results of these surveys then served as focal points in staff development - supervision functions. One of these senior participants wrote a computer program to score the actual and preferred instruments of the Classroom Environment Scale (short form), and he has started to write a manual to guide his staff in attempts to assess and change their classroom environment.

Another Secondary teacher was particularly interested in the effects two different teaching methods would have on his students' perceptions of the actual classroom environment. He taught for approximately five weeks, concentrating upon 'chalk and talk' methods, and assessed the students' perceptions of the actual environment using the Classroom Environment Scale (short form). Then followed an 'activities' approach for another five weeks with a new topic, and the actual environment was then assessed again. Although this teacher noticed some significant differences in the environment according to the method employed, he decided not to change his planned approach for the remainder of the year. Rather, he intended to reverse the methods used to teach

these two topics in 1985, and so try to 'control' for subject matter in his experiments with his teaching strategies. He believes that this approach may be very beneficial to him and his students.

One participant became very involved in 'time-on-task' aspects in a number of classrooms in her Primary School. Her involvement here was facilitated by the fact that during the year she was released from her normal classroom role to relieve in a Senior Teacher capacity. She calculated student 'engagement rates' in several subject areas in several classes, and she revealed that "many other teachers have been willing to try this in their classes, and we were able to compare class engagement rates, so each teacher was able to determine what would be acceptable for him/her in his/her classes." This teacher also observed several classes in order to draw student movement patterns, and these provided data for follow-up discussion. Further, she blended 'time-on-task' and 'co-operative learning' orientations to focus on one particular child in Grade 1. Excerpts from her report on this strategy are presented below.

11.00 Teacher : What are you doing Annitah?  
Annitah : Looking for my workbook.

She kneels on her chair and finally locates the book in her desk. She goes to a nearby table to borrow a pencil. She comes back to her chair, kneels on one leg and puts hand under chin and watches another child. She looks to the left and listens to a conversation.

11.07 Annitah finally puts pen to paper.  
11.08 Teacher : Annitah, you've done two lines.  
Why haven't you written more?  
Annitah : Because people annoy me.  
Teacher : How do they annoy you?  
Annitah : They talk to me and I can't work.  
Teacher : Well how can we change that?

- Annitah : I could sit over at the red table, then I could work faster.  
Teacher : let's try that then.
- 11.10 Annitah moves and begins work.
- 11.13 Teacher : I'm glad you have finished. It wasn't hard was it?  
Annitah : No.  
Teacher : It took a very long time to do that card. Do you think you could do it quicker?  
Annitah : Yes.  
Teacher : Well get another card. This time perhaps a friend could help you. Who would you like to help you?  
Annitah : Chelsea.  
Teacher : Right, Chelsea, would you like to help Annitah please? Every time she stops writing I want you to tell me.
- 11.15 Annitah and Chelsea start work.
- 11.17 Chelsea : She's stopped.  
Annitah quickly starts work again.
- 11.20 Annitah : I've finished (beaming all over)  
.....
- 11.23 Annitah started work on another card and finished it at 11.27, having stopped once.

This method continued for several days and Annitah's partner was changed from time to time. Eventually she did a card by herself without a peer helper. It took her five minutes and she was very pleased with herself.

.....  
Since then Annitah has worked much better. She sometimes needs a reminder or a helper, but generally she performs much better and is much more confident and has more self-esteem. She has even offered to help other children, and says "I was slow once, wasn't I."

- A significant innovation was reported by a Grade 3 teacher, and this is given attention below. He exposed his students to four different modes of paired reading activities :
1. Reading with an older child from Grade 5 for six weeks;
  2. Reading with a partner from within the same class for the next six weeks;
  3. Reading with a different partner from within the same class, using the Neurological Impress Method, for the next six weeks;
  4. Reading with a younger child from Grade 1 for another six weeks.

Data are available for the first three steps in this process. The Burt Word Recognition Test was administered to the class by another teacher at the start of Step 1, and then again at the end of Steps 1, 2 and 3. The 'reading age' gains recorded by each child are displayed in Figure 13. The words of the teacher give an indication of his impressions of the utility of the approach he had taken :

The Grade 5 partner readily accepted the responsibility of leadership and a strong caring relationship frequently arose. The Grade 5 partners frequently undertook sub-programs of their own, writing flash cards for their partners and setting reading 'homework' which was enthusiastically undertaken by the younger child.... The relationships created in the program undoubtedly had a far reaching effect upon school discipline and frictional interactions, both within the classroom and general school environment.... Younger children actively sought out their older partner at playtimes and the older children were willing to help the younger child in difficult situations outside the classroom.

Clearly, according to the Burt test, substantial gains have been made by the majority of children across the ability range.

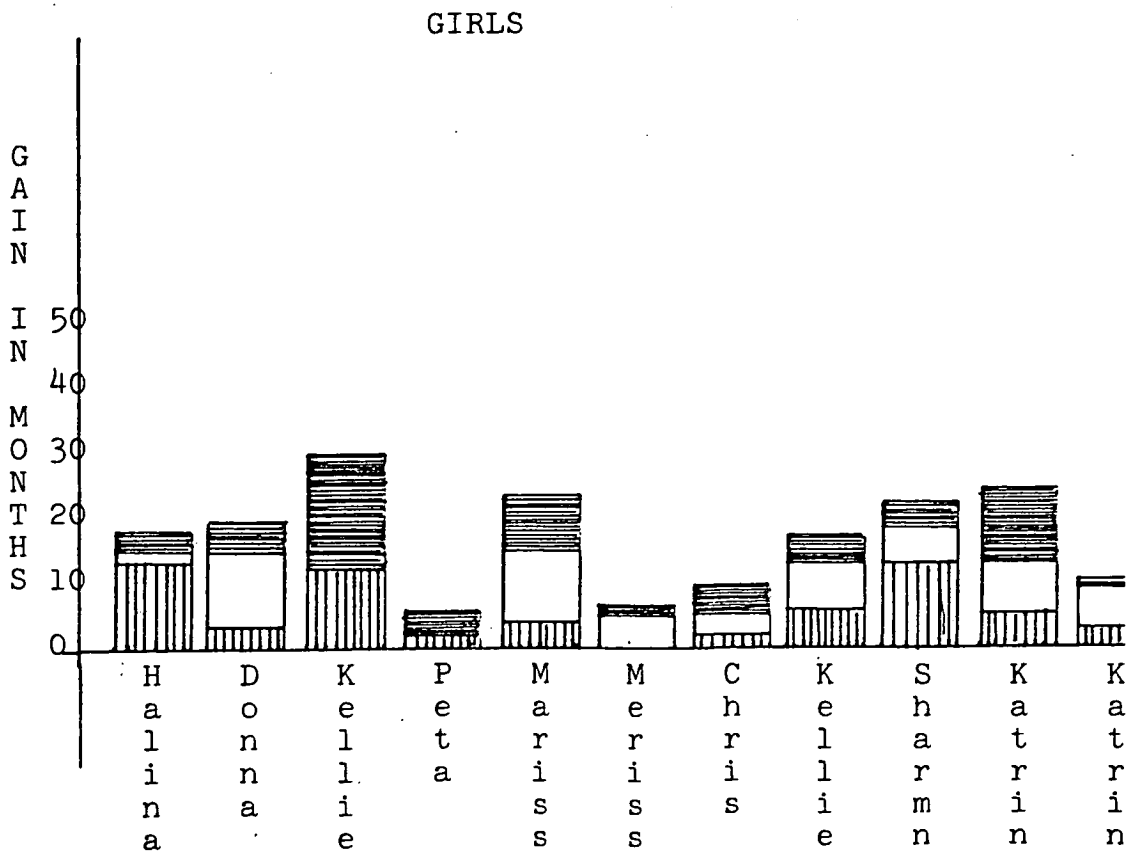
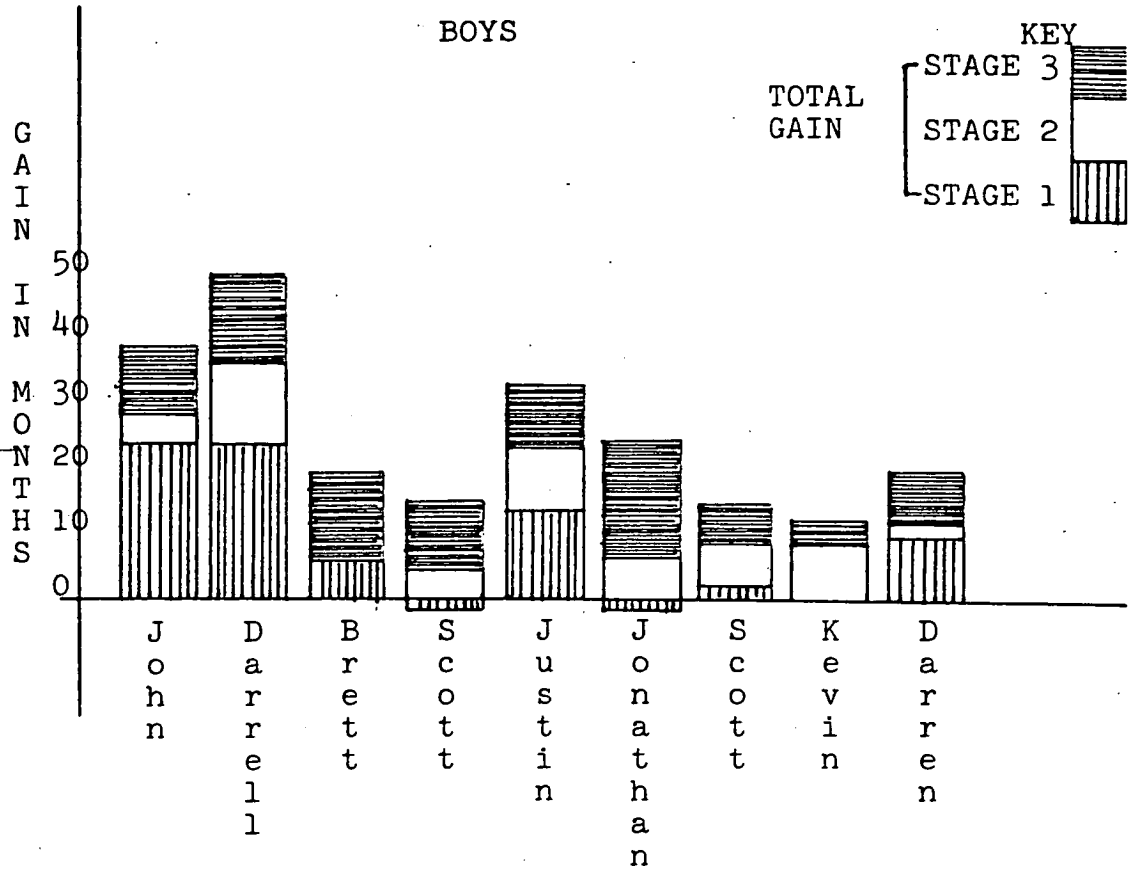
The partner work within the room added much to our classroom environment and the same partners were used in many other forms of activities.

All children showed a marked positive response to the Neurological Impress Method, with the largest gain being 16 months in the six weeks of the program.

By pairing with Grade 1's, I hope that all children in my class will have experienced all roles within the program, providing for the development of confidence, a caring attitude and self-esteem in their own work and ability.

Figure 13

INCREASE IN READING AGE  
DUE TO THREE METHODS OF PARTNER READING





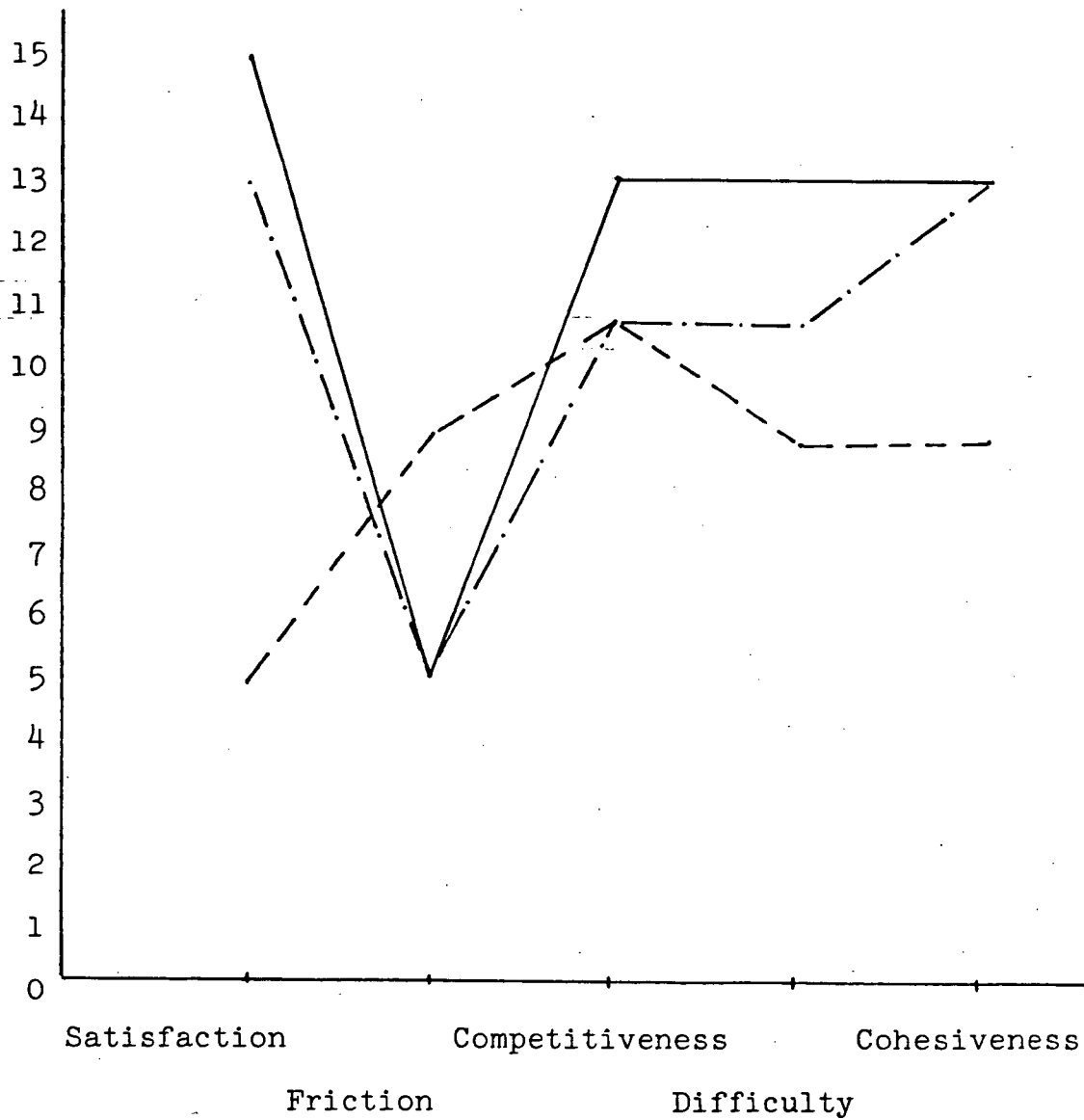
## THE OBSERVED OUTPUTS OF THE PROGRAM

Some of the actual interactions between the program's participants and their environments, at the most general level, were inferred from the artifacts produced by them and from their oral and written reports. No attempt was made to observe (either directly or through video/audio tape) participants in their classroom/school environments.

It seems that the first desired outcome, which was concerned with classroom environment 'engineering' was satisfied in large measure. All classroom teachers among the participants effectively transferred their learning from the workshops to their classroom situations in order to gauge the extent of actual-preferred environment discrepancies. In addition, a number of colleagues of these teachers were also able to demonstrate this skill. Some teachers were quite happy with the profiles generated, and consequently did not progress through the entire recommended process. However, all those teachers who were concerned over the size of the discrepancies demonstrated that they could 'engineer' their classroom environment in the required direction. Some teachers repeated the entire 'engineering' process on a number of occasions, while others engaged in the process once only. Figure 14 vividly depicts the success one teacher had with her Grade 6 class. She was able to change the classroom environment in the required direction in all but one of the dimensions (competitiveness)

Figure 14

THE RESULTS OF CLASSROOM ENVIRONMENT  
'ENGINEERING' IN A GRADE 6 CLASS  
AS REVEALED BY THE MY CLASS INVENTORY



Student perceptions of their preferred environment in April

Student perceptions of their actual environment in April

Student perceptions of their actual environment in May

and to achieve perfect congruence in two of them (friction and cohesiveness).

While hard data were displayed by only one participant in the area of time management, most others revealed that they were convinced that they were more conscious of time wasting behaviours and of the need to pay close attention to student academic learning time.

The program leaders were particularly impressed with the initiatives taken by participants in the areas of student leadership, responsibility, co-operative activity and participation in decision-making. Some of the data to support this view were referred to earlier in this report. It is clear that most of the participants (and a number of their colleagues/subordinates) have moved some way towards a belief in the potency of these four aspects and towards integrating them into their classrooms. The Primary School teachers in the group, particularly, accepted attention to these aspects as valuable counters to excessive friction and competitiveness (as seen through the eyes of students) in their classrooms.

Summarising to this point, the program leaders were satisfied that three of the eight general goals or desired outcomes were being achieved in good measure. No data, however, were gathered on the extent to which the five remaining general goals were being achieved. Nevertheless, the leaders speculated that at least two further general goals were being satisfied to some extent. It has been argued here that student actual-preferred classroom environment

congruence promotes high quality learning and that discrepancy hinders such learning. It will be recalled that some teachers among the group were comfortable with the classroom environment profiles generated from data provided by their students. If such comfort was warranted, it follows that the students of these teachers were enjoying high quality learning. The remaining teachers, those who were concerned over the size of the profile discrepancies, intervened in ways that did lead to closer actual-preferred congruence. The students of these teachers, therefore, must have enjoyed higher quality learning than previously. If this argument is acceptable, it follows that the third desired outcome, "To encourage teacher behaviours that might assist students to avoid any sense of learned helplessness", was of no real concern to the first group of teachers, and was at least partially achieved by the second. If success does in fact breed success, it is likely that the students of the teacher who employed peer and cross-age tutoring (see pages 91-93) and Annitah (see pages 90-91), were likely to have avoided or overcome any sense of academic futility.

The sixth desired outcome was the provision of "satisfying and fulfilling experiences in the educational process" through the provision of a 'human curriculum'. There is no doubt that the teachers in the program generally provided more opportunity for their students to work together in co-operative groups and to take greater responsibility for their processes and products. Is it true that children, generally, when given the opportunity, will derive current enjoyment from working together in a co-operative mode, and that they will, inevitably, put personal meanings on the content at hand?

If the answer to this double-barrelled question is "Yes", then the data presented would tend to persuade the reader that the students affected by this program were, overall, provided with a 'human curriculum' beyond the ordinary.

To this point, the report has attempted to describe and judge the development and implementation of "Managing the Classroom Environment". It is opportune to now move to a concluding statement.

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## CHAPTER 7

### CONCLUSION

The Katz and Morgan strategy was particularly useful in mapping and assessing the program's intents and realities during its development and implementation. The logic of the strategy is also useful to draw summative evaluation conclusions. Indeed, even though the report reflects the use of the strategy for formative purposes, the report could be read from a summative orientation. The ultimate purpose of the program was described and judged to be of value. Similarly, the desired outcomes of the program were described and judged to be of value in that it was expected that the achievement of these outcomes would ensure that the ultimate purpose of the program was satisfied. Many of these outcomes were achieved, and hence, it is judged that the program did in fact satisfy its ultimate purpose : the quality of learning enjoyed by the students of the program's participants was enhanced, and there was a spill-over effect to students of a number of colleagues of these participants.

This report has concerned itself only with the processes and products of the program during 1984. It is interesting though, to contemplate future outcomes. In particular, will the participants from this group maintain their new/refined behaviours? Several written comments by participants toward the end of the year are illuminating :

The course may end in one year but its effect will continue, and some of the techniques and information gained here will spread to other supervisory personnel in my school in the future.

Despite some initial reservations, I have found this course most refreshing and most interesting - far better than any other teacher rejuvenation programme with which I have been in contact.

The sessions have been most rewarding and I feel that I have gained a lot of 'food for thought' and in some cases very worthwhile research and tests to be used.

The leaders of the program are confident that it will continue to impact on at least several of the participating schools for a number of years.

It is inevitable that interested people on the fringes of any program will conduct their own (informal) evaluations on the basis of what they 'see' and 'hear'. A number of such people have conveyed their impressions of the program to its two leaders (and no doubt to others). The co-ordinator of the teachers' centre at which the workshops were held spent a number of hours 'sitting in' on the activities and in discussing them with participants. He revealed, during and at the end of the year, that he would continue to support and promote "Managing the Classroom Environment". Decision-makers within Tasmania's Centre for Continuing Education of Teachers secured details of the program, and have initiated steps to incorporate its major features in a new subject to be offered to the teachers of Tasmania. A Regional Secondary Schools Superintendent was particularly impressed with the Primary-Secondary mix of the program and with its attention to the classroom environment, and invited the two leaders of the program to describe it to a gathering of 140 senior teachers in his region. Of course, these people have their own reasons for making such judgements, but such judgements, when coming from these diverse areas, pleased the leaders of the program.

Despite these positive responses, several aspects will need to be contemplated before offering the program again. The cost of the workshops alone included over 100 worker-days, accommodation for two people for seven nights, 1,500 kilometers of travel, countless hours of preparation, and the occupation of work spaces for 60 hours. The number of days spent in the workshops had to be reduced because funding sources in the schools and the college became exhausted. This was due, in part, to a lack of planning by these institutions. In future, the management group promoting the program must initiate its activities at an earlier date so that the institutions have more lead-time in which to adequately budget their resources. It is fair to say that in 1984 the program's leaders paid too much emphasis to the 'academic' aspects of the program at the expense of a number of 'administrative' necessities.

If the process goal concerning involvement of school Principals and other senior personnel is to be retained in the program, the program leaders will need to liaise much more closely with them. This deficiency became evident as the program progressed, but by that stage it was judged that little could be done to rectify the situation. In future, if these school personnel are involved more heavily in the planning of the program, they will be more likely to become involved in its delivery.



The process goal which sought to help colleagues to practice clinical supervision was not satisfied. It is likely that this was the result of school-related factors rather than to inadequate attention to the rationale/process/roles/skills in the workshop sessions. If this process goal is to be retained in the future, the program (or a complementary one) will need to attend to the preconditions for change in the schools before it is mounted. This will be facilitated by greater involvement of Principals in the planning of the program. At this stage though, it is the program leaders' opinion that workshop time would be more profitably used if it was allocated to alternative purposes. This is not to say that attention to 'colleagues helping each other to improve their teaching' should be downgraded. Rather, it is recommended that a search be undertaken for less formal and less time consuming strategies, and that these be integrated into the program instead.

All teachers did reflect upon their teaching behaviours, and as a result some behaviours were abandoned, while others were modified, and some new ones added. In addition, many participants assisted a number of colleagues/subordinates to amend, similarly, their teaching repertoires. Although no data were collected on the extent to which the eighth desired outcome, that one concerned with promoting behaviours

of high technical quality in terms of questioning, reinforcement and so on, was satisfied, it is unlikely that much progress was made in the area. It is probable that inadequate attention was paid to this goal during the workshops, and the non-adoption of clinical supervision practices would have further limited the possibility of success. It is recommended that this goal be abandoned, or at least not upgraded, in the future. The goal is certainly important, but it may be more appropriate to another program.

The Turney et al (1982) orientation to clinical supervision was directed at assisting student teachers while they are completing practice sessions in schools. On a number of occasions, the participants in the program indicated that they thought the process could be used with good effect during such sessions. Some Tasmanian school children are taught by student teachers for up to 16 weeks during any one year - a high proportion of the academic calendar - and high quality guidance of these student teachers would be significant in ensuring high quality learning for the children concerned. If the eighth desired outcome is abandoned or downgraded, it is recommended that clinical supervision of student teachers be its substitute. An added advantage of this inclusion would be that teachers would gain experience and expertise in the roles and skills of clinical supervision, and may, therefore, find it easier to practice the method with their school colleagues.

Simply because a program satisfies its purpose (regardless of how meritorious that purpose might be) it does not necessarily follow that the program has value. Perhaps that purpose could be more effectively and efficiently satisfied by an alternative expenditure of resources. Some of the costs of this program have been indicated, and decision-makers will need to contemplate these costs and the alternatives to which they can be put when considering whether or not to mount the program again. Perhaps, given the barriers to the adoption of clinical supervision encountered in this program, the resources may be better spent in attempting to change school climates rather than classroom environments.

Given that "Managing the Classroom Environment" was not optimally effective and efficient in satisfying its purpose, which follows from the fact that not all of its desired processes or outcomes were satisfied, can the program be judged to have value? Charles Lindblom (1980) presented a strong argument to the effect that decision-makers, due in part to a lack of time and knowledge of the attributes of the whole range of alternatives, do not attempt to seek optimum outcomes. Rather, he claimed that they attempt to 'satisfice' by reaching a situation somewhat inferior to the optimum, but one which is feasible, and that they then 'nibble at the edges' to improve the outcomes in the future. Given this orientation, it is judged that the program did have value, but it is also judged that it can be improved in the future.

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